

Historic, Archive Document

Do not assume content reflects current scientific knowledge, policies, or practices.





Annual Catalogue and Price List for 1916



Vogeler Seed Company
Salt Lake City, Utah

TO THE TRADE—How to Order By Mail

NAME AND ADDRESS SHOULD ALWAYS BE GIVEN.—Frequently we receive unsigned letters. Sometimes they contain money and orders. Sometimes too, letters are received in which the name of the town is left out and the postmark is blurred. We cannot fill orders unless we know the name and address of the buyer. The easiest way for you is to use our order sheet filling in the blanks. When customers fail to receive their goods in a reasonable time they should write us, and at the same time send a copy of their order, naming the date on which the former one was sent, and the amount of money enclosed, and in what form. This will enable us to investigate the matter.

CASH WITH ORDER.—The proper way is to send remittance in full to cover order and postage. We send orders C. O. D. only if 25 per cent of the amount of order is enclosed. Plants we never send out C. O. D.

HOW TO SEND MONEY.—Remittances may be made by any of the following methods, viz: Postal Money Order, Draft on Salt Lake City, or Express Company's Money Order. Registered Letter, or cash may be sent by express. Remittances sent in any other way are entirely at the sender's risk. Small amounts may be sent in two cent postage stamps.

WHEN TO ORDER.—We endeavor, when placing our catalogue in the hands of our regular customers, early in January, to have our stock of seeds, etc., complete in every respect; and those of our patrons who favor us with their orders early are sure of receiving prompt attention, and assist us in reducing the heavy strain which always occurs as the season advances. Order early and avoid delays.

USE THE ORDER SHEET.—In each copy of our catalogue we place an order sheet. It will aid us greatly if you will make your order out upon it, using one line for each article ordered, and as far as possible write them in the way they are catalogued, beginning at the front. We will gladly furnish you additional order sheets if you write for them.

NOTICE CAREFULLY THE PRICES.—Be sure to know whether we or you are to pay the freight or express, and bear in mind that we do not pay the express or freight charges except when quoted prepaid, nor on farm seeds, poultry supplies, etc.

THE PRICES WE QUOTE on vegetable and flower seeds will hold good as long as stocks last. The prices on grass seed, grains and all farm seeds and poultry supplies are those ruling January 1st, 1916, and are subject to change. As far as possible we will fill in full all orders for seeds that are quoted subject to variation in price, but if market values will not permit this, we will send all that money remitted will pay for.

FREE OF POSTAGE OR EXPRESS CHARGES.—Packets, ounces, quarter pounds or pounds, ordered at list prices, will be sent free by mail or express, and upon all goods quoted in our catalogue, where it says: Prepaid by Mail or Express.

Customers ordering enough for a freight shipment, 100 pounds or more, or desiring to pay their own express charges, may deduct 10 cents per pound from prices of this catalogue on all seeds quoted by the pound or less.

SEEDS BY WEIGHT.—We supply half pound and over at pound rates; less half pound lots are charged at ounce, or quarter pound rates; 25 lbs. and over at 100 lb. rates when quoted.

SEEDS IN PACKETS.—We offer the following inducements to those wishing to purchase seeds in packets: Select packets to the value of \$1.15 and send us \$1.00; for \$2.35 send \$2.00; for \$3.60 send \$3.00; for \$4.85 send \$4.00; for \$6.15 send \$5.00; for \$12.50 send \$10.00; for \$26.00 send \$20.00. The seeds will be sent by mail, postpaid, but these low rates apply to seeds in packets only and at catalogue prices and not to seeds by weight.

PARCELS POST.—A new and adequate Parcels Post law now applies to shipments of seeds, bulbs, plants and poultry supplies (except poisons and liquids). Packages are subject to a limit or maximum weight in the first and second zones of 50 lbs.; and in all other zones, third to eighth, of 20 lbs. The maximum size of a package is 72 inches for combined length and largest girth. Insurance will be effected only when asked for and remitted for as follows: Parcels to the value of \$25 or under for 5c; to the value of \$25 to \$50 for 10c.

ZONE RATES may be had by application to your postmaster, who will tell you the zone which you are in with reference to Salt Lake City, or we will tell you as nearly as we can if you write us.

	DOMESTIC PARCELS POST RATES On Seeds, Plants, Bulbs, Roots, Books, Tools, etc., within the U. S. and Possessions.	First pound or Fraction	Each addi- tional pound or fraction
First Zone—Salt Lake City and within 50 miles of Salt Lake City.....	5c.	1c.	
Second Zone within 50 to 150 miles of Salt Lake City.....	5c.	1c.	
Third Zone within 150 to 300 miles of Salt Lake City.....	6c.	2c.	
Fourth Zone within 300 to 600 miles of Salt Lake City.....	7c.	4c.	
Fifth Zone within 600 to 1000 miles of Salt Lake City.....	8c.	6c.	
Sixth Zone within 1000 to 1400 miles of Salt Lake City.....	9c.	8c.	
Seventh Zone within 1400 to 1800 miles of Salt Lake City.....	11c.	10c.	
Eighth Zone all over 1800 miles of Salt Lake City.....	12c.	12c.	

FOR PARCELS WEIGHING 8 OUNCES OR LESS, containing seeds, bulbs or books only, the rate of postage to all zones is 1 cent for two ounces or fraction. (Over 8 oz. the parcels post rates apply.)

FOR PARCELS CONTAINING FOURTH CLASS MATTER—other than the above—up to four ounces is permitted to all zones at 1 cent per oz. (Over 4-oz. the above zone rates apply.)

NON-WARRANTY.—Complaints made that seeds are not good, should quite as often be attributed to other causes, as to the quality of the seeds. There are hundreds of contingencies continually arising, to prevent the best seeds always giving satisfaction, such as sowing too deep, too shallow, in too wet or too dry soil; insects of all descriptions destroying the plants as soon as or before they appear; wet weather, cold weather, frosts, chemical changes in the seeds induced by temperature, etc. For the above reasons it is impracticable to guarantee seeds under all circumstances.

While we exercise the greatest care to have all seeds pure and reliable, we do not give, and our agents and employees are forbidden to give, any warranty, express or implied, as to description, quality, productiveness or any other matter of any seeds, plants or bulbs we send out and we will not be in any way responsible for the crop. If the purchaser does not accept the goods on these conditions, he must notify us at once and we will give instructions for disposition of goods. The acceptance of seeds under these conditions shall constitute your consent to the purchase.

January, 1916.

VOGELER SEED CO.

Special Notice:

We shall esteem it a favor if you will give us in the spaces below the NAMES and ADDRESSES of any of your friends that are interested in gardening. We wish to send them our CATALOGUE.

NAMES

POST OFFICE

STATE



In common with other responsible seed houses, we sell our goods subject to the following disclaimer.

In common with other responsible seed houses, we sell our goods subject to the following disclaimer: While we exercise the greatest care to have all seeds pure and reliable, we do not give, and our agents and employees are forbidden to give, any warranty, express or implied, as to description, quality, productiveness or any other matter of any seeds, plants or bulbs we send out and we will not be in any way responsible for the crop. If the purchaser does not accept the goods on these conditions, he must notify us at once and we will give instructions for disposition of goods. The acceptance of seeds under these conditions shall constitute your consent to the purchase.

ORDER SHEET FOR PURITY SEEDS
FROM
VOGELER SEED CO. - **SALT LAKE CITY, UTAH**

No Goods Sent C. O. D. Our Terms are Cash with All Orders.

HOW TO SEND MONEY

Remittances may be made by P. O. Money Order, Express Money Order, Bank Draft, Express, or by Registered Letter.

When notes are not obtainable, or to make proper change, we accept postage stamps the same as cash. Any denomination will be accepted, but we prefer our customers to send two-cent stamps when convenient, as we use more of these than any other.

Names of persons and places, though familiar to writers, are often puzzling to others, hence please be particular to write your name and address distinctly and in full with each order. We are continually receiving orders where this is neglected, and are obliged to retain them until we hear again from the writer.

DIRECTIONS FOR ORDERING

SEEDS POSTPAID BY MAIL.

At prices quoted in this Catalogue, we send all Vegetable Seeds by the packet, ounce, quarter pound, pound, and all Flower Seeds by Mail, postage prepaid, without any extra expense to the purchaser. They do not, however, include delivery charges on larger quantities. If you order Vegetable and Flower Seeds by the pound, to be sent by freight or express, at your expense, you are entitled to deduct 10 cents per pound from prices quoted.

Extra Order Sheets and Return Envelopes Sent on Application.

Your Name { MR., MISS } OR MRS.

*Street Address or
No. Rural Delivery*

Post Office

County _____ State _____
(MAIL TO _____)

Forward this Order by {EXPRESS OR } FREIGHT

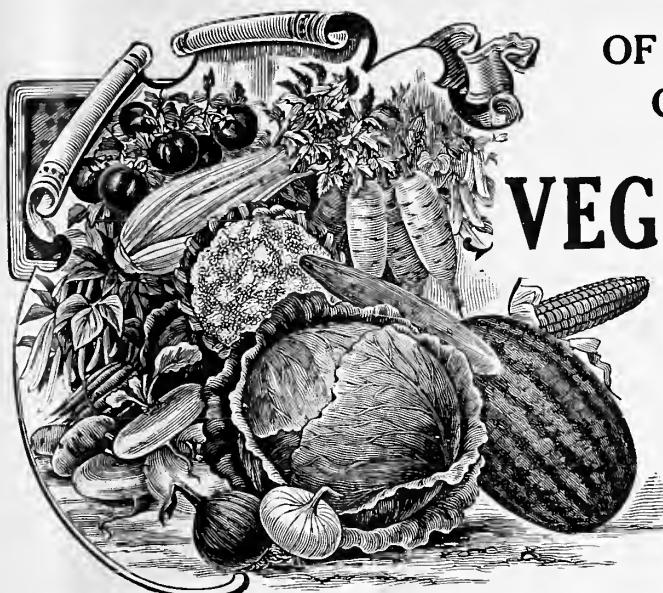
Date	191 ..
Amount Enclosed	
Money Order - - -	\$.....
Postage Stamps - - -	\$.....
Draft - - -	\$.....
Coin or Currency - - -	\$.....
Total - - -	\$.....
<hr/>	
Our Order No.	

Pounds	Ounces	Packets			PRICE	
					Dollars	Cents
NAMES OF ARTICLES WANTED						
AMOUNT BROUGHT FORWARD						

NAMES OF ARTICLES WANTED

AMOUNT BROUGHT FORWARD

DESCRIPTIVE LIST



OF NEW AND
CHOICE

VEGETABLE SEEDS

SEASON
1916

To Our Friends and Patrons

VOGLER SEEDS SUBMIT for your consideration our 1916 Catalogue. We wish at this time to thank our many patrons for their liberal patronage, and to emphasize the importance of purchasing your season's needs early. By reason of the war in Europe, many imported seeds will be in very short supply. As usual, we have excellent stocks and are prepared to promptly fill all orders entrusted to us.

The prices in this Catalogue are extremely low for first-class stock, and in most cases include postage or express charges prepaid to your door.

We assure our customers that every order, large or small, will receive prompt and careful attention, and so far as lies within our power, we shall endeavor to make every purchaser a satisfied one.

Trusting that 1916 will bring an increased measure of prosperity and happiness to all our friends and customers, we remain.

Very truly,

VOGELER SEED CO.



Special Notice:

We shall esteem it a favor if you will give us in the spaces below the NAMES and ADDRESSES of any of your friends that are interested in gardening. We wish to send them our CATALOGUE.

THE ESSENTIALS TO THE PRODUCTION OF CHOICE VEGETABLES AND BEAUTIFUL FLOWERS.

GOOD SOIL.

A rich, sandy loam is the best, but a fair degree of success may be secured from any soil which can be made rich and friable. Good vegetables cannot be grown on barren sand, a cold, hard, lumpy clay, nor in the shade of orchard or other trees.

LIBERAL MANURING.

A soil which does not need enriching in order to produce the best results is rarely found and very often success is in proportion to the liberality with which fertilizers have been used.

Well decomposed stable manure, where straw bedding has been used, is the best; that where sawdust is used is not so good. Often wood ashes, at the rate of one peck to one bushel to the square rod, will be of great benefit. Commercial fertilizers are excellent, and may be used at the rate of four to twelve pounds to the square rod, and the more concentrated forms—such as Nitrate of Soda, Guano, Dried Blood and Potash Salts—at the rate of one to six pounds to the rod. A mass or lump of any of the commercial fertilizers, even if it is but a quarter of inch in diameter, is liable to kill any seed or young plant which comes in contact with it, so it is very important that they be thoroughly pulverized and mixed with the soil.

THOROUGH PREPARATION.

Rich soil and liberal manuring will avail little without thorough preparation. The soil must be made friable by thorough and judicious working; if this is well done all that follows will be easy; if it is neglected, only partial success is possible, and that at the cost of a great deal of hard work. The garden should be well plowed or dug to a good depth, taking care, if it is a clay soil, that the work is not done when it is too wet. If a handful from the furrow moulds with slight pressure into a ball which cannot be easily crumbled into fine earth again, the soil is too wet, and if stirred then will be hard to work all summer. The surface should be made as fine and smooth as possible with the harrow or rake. It is generally necessary to plow the whole garden at once, and to do this in time for the earliest crops, but the part which is not planted for some weeks should be kept mellow by frequent cultivation.

GOOD SEEDS, PROPERLY PLANTED.

There is no more prolific source of disappointment and failure among amateur gardeners than hasty, careless or improper sowing of the seed. The seed consists of a minute plant, minus the root, with a sufficient amount of food stowed in or around it to sustain it until it can expand its leaves, form roots and provide for itself, the whole inclosed in a hard and more or less impervious shell. To secure germination, moisture, heat and a certain amount of air are necessary. The first steps are the softening of the hard outer shell and the leaves of the plant from the absorption of water, and the changing of the plant food from the form of starch to that of sugar. In the first condition the food is easily preserved unchanged, but the plant cannot use it, while in its sugary condition it is easily appropriated by perishable, and if not used it speedily decays itself and causes decay in the plant. A dry seed may re-

tain its vitality and remain unchanged for years, but after germination has commenced, a check of a day or two in the process may be fatal. There is no time in the life of a plant when it is so susceptible to fatal injury from the over-abundance or want of sufficient heat and moisture as at that between the commencement of germination and the formation of the first true leaves, and it is just then that it needs the aid of a gardener to secure favorable conditions. These are:

First—A proper and constant degree of moisture. The soil should always be moist, never wet. This is secured by making the surface of freshly dug soil so fine and the pressing it over the seeds so firmly with the feet or the back of the hoe that the degree of moisture remains as nearly uniform as possible.

Second—A proper degree of heat, secured by sowing the seed when the temperature of the soil is that most favorable to the germination of the seed of that particular plant. Too high a temperature is often as detrimental as one too low. The proper temperature for each sort may be learned from a careful study of the following pages and the experience of the most successful gardeners in your vicinity.

Third—Covering the seed to such a depth that while a uniform degree of heat and moisture is preserved, the necessary air can readily reach the germinating seed, and the tiny stem push the forming leaves into the light and air. This depth will vary with different seeds and conditions of the soil, and can be learned only from practical experience. In general, seeds of the size of the turnip should not be covered with more than half an inch of earth pressed down, while corn may be an inch, beans one to two inches, and peas one to four inches deep.

Fourth—Such a condition of soil that the ascending stem can easily penetrate it, and the young roots speedily find suitable food. We can usually secure this by thorough preparation of the ground, and taking care **never to sow fine seeds when the ground is wet**. Occasionally a heavy or long continued rain followed by a bright sun will so bake and crust the surface that it is impossible for the young plant to find its way through it, or a few days of strong wind will so dry the ground that the young plants will be killed. In such cases the only remedy is to plant again.

JUDICIOUS CULTIVATION.

Not only should every weed be removed as soon as it appears, but the crust which forms after a rain should be broken up and the ground stirred as soon as it is dry enough to permit it. The more frequently and deeply the soil is stirred while the plants are young, the better, but as they develop and the roots occupy the ground, cultivation should be shallower, until it becomes a mere stirring of the surface. We have seen hundreds of acres of vegetables where the yield and quality have been materially lowered by injudiciously deep and close cultivation after the roots of the plants had fully occupied the ground. A very small garden, well cultivated and cared for, will give larger returns and be in every way more satisfactory than a much larger one poorly prepared and neglected.

HOW TO BUILD AND MANAGE HOT-BEDS.

FOR early vegetables some provision for starting certain plants earlier than can be done in the open air is desirable; for this purpose nothing is better than a good hot-bed, and its construction is so simple and the expense so slight that every garden should have one. A hot-bed proper not only protects the plants from the cold, but supplies **bottom heat**. By this term the gardener means that the soil is constantly kept several degrees warmer than the air above, that being the condition, so far as heat is concerned, which is most favorable for rapid and vigorous growth, and gardeners usually secure it by making a compact pile of some fermenting material and covering it with the earth in which plants are to grow.

HEATING MATERIAL.—The best heating material that is easily available is **fresh horse manure**, containing a liberal quantity of straw bedding. Such manure, if thrown into a loose pile, will heat violently and unevenly, and will soon become cold. What is wanted in the hot-bed is a steady and moderate but lasting heat. To secure this, the manure should be forked over, shaken apart and, if dry, watered and allowed to stand a few days and then be forked over again, piled and allowed to heat a second time, the object being to get the whole mass into a uniform degree of fermentation, and as soon as this is accomplished it is fit for use.

SASH.—Gardeners commonly use sash made especially for hot-beds and glazed with small lights cut from odds and ends, and so furnished at very low rates. Such sash can usually be procured in any of our large cities, and costs much less than if made to order. For garden use, however, we much prefer a smaller sash that can be easily handled, and the use of larger and better glass. We would recommend that for home gardens, the sash be about two and one-half by four or five feet, and that the glass be not less than 10-14, laid with not more than one-quarter inch lap. In giving the order to one unaccustomed to the work, it would be well to state what they are to be used for, and that they need to be made like skylight sash.

THE FRAME.—This may be made of sound one-inch lumber, the back twelve to fourteen inches high, the front ten to twelve. It should be well fitted to the sash, so as to leave as little opening as possible and yet allow the sash to be easily moved up and down, even when the frame is quite wet.

THE SOIL.—This should be **light, rich, friable**. Any considerable amount of clay in it is very objectionable. If possible it should be unfrozen when put into the bed; for this reason, it is much better to prepare in the fall before, and cover the pile with enough coarse manure or straw to keep out the frost.

MAKING THE BED.—This requires careful attention, as future success depends largely upon the manner in which this work is done. Having cleared away snow and ice, build a rectangular bed one foot larger each way than the frame to be used, carefully shaking out and spreading each forkful and repeatedly treading down the manure so as to make the bed as uniform as possible in solidity, composition and moisture. It is of the utmost importance that this shaking apart and evenly pressing down of the manure should be carefully and thoroughly done; unless it is, one portion will heat quicker than the others, and the soil will settle unevenly, making it impossible to raise good plants. The proper depth of the bed will vary with the climate, season and the kind of plants to be raised. A shallow bed will quickly give a high temperature, which will soon subside; a deeper one, if well made, will heat more moderately, but continue much longer. For general purposes, a bed about two feet deep will be best.

The bed completed, the frame and sash may be put on, and fresh manure carefully packed around the outside to the very top—if the weather is at all severe, this outside banking should be replenished as it settles. The bed should then be allowed to stand with the sash partly open for a day or two to allow the steam and rank heat to pass off. The earth should

then be put on and carefully leveled. Care should be taken that the soil is dry and friable. If wet or frozen soil must be used, it should be placed in small piles until well dried out before spreading. The heat at first will be quite violent, frequently rising to 120 degrees; but it soon subsides, and when it recedes to 90 degrees the seed may be planted. The importance of using dry soil and allowing the first rank heat to pass off is very great. Every season thousands of hot-beds fail of good results from these causes, and seedsmen are blamed for failure resulting from overheating, or wet or soggy soil.

MANAGEMENT OF THE BED.—The essentials for success are a steady, uniform degree of heat and moisture; keeping the soil at all times a few degrees warmer than the air and the careful "hardening off" (by exposure to the air and diminishing the supply of water) of the plants before transplanting into the open air. Simple as these may seem to be, there are many difficulties in the way of securing them, prominent among which are overheating the air under a bright sun. Without experience one would scarcely believe how quickly the temperature inside of a well built hot-bed will rise to 90 or 100 degrees upon a still sunny day, even when the temperature outside is far below freezing, or how quickly the temperature will fall to that outside, if upon a windy cloudy day the sash is left open ever so little. A rush of cold air driven over the plants is far more injurious than the same temperature when the air is still. Again, in cloudy weather a bed will go several days without watering, but will dry up in an hour when open on a sunny day. The details of management, however, must be learned by experience, but may be easily acquired by one who gives the matter careful attention, keeping constantly in mind the essentials given above.

A COLD FRAME is a simple construction of boards for wintering over young plants—Cabbage, Lettuce, Cauliflower, Broccoli, etc.—and is also extremely useful to protect and harden off plants from the greenhouse or hot-bed before fully exposing them in the open air.

Select a dry, southern exposure, form a frame from four to six feet wide and as long as required. The black should be fourteen to eighteen inches high, and the front eight to twelve, with a cross-tie every three feet. The frame may be covered with sash or cloth. Seeds of the vegetable to be wintered, sown in open border early in September, will be ready to plant in cold frames about the last of October. The soil should be well prepared and smoothly raked before planting. Admit air freely on pleasant days, but keep close in severe weather.

TRANSPLANTING.—In transplanting, the main points to be regarded are: Care in taking up the plants, so as to avoid injury to the roots, planting firmly so as to enable the plant to take a secure hold of the soil, reducing the top to prevent evaporation, and shading to prevent the hot sun from withering and blighting the leaves. In transplanting from a hot-bed, harden the plants by letting them get quite dry a day or two before, but give an abundance of water a few hours before they are taken out. It is most apt to be successful if done just at evening or immediately before or during the first part of a rain—about the worst time being just after a rain, when, the ground being wet, it is impossible to sufficiently press it about the plant without its baking hard. If water is used at all, it should be used freely, and the wet surface immediately covered with dry soil.

WATERING.—The best time to water plants is between sunset and sunrise. Water may be given to the roots at any time, but should never be sprinkled over the leaves while they are exposed to bright sunshine. If watering a plant has been commenced, continue to supply it as needed, or more injury than good will result from what has been given. One copius watering is better than many scanty sprinklings. The ground should always be stirred with a hoe or rake as soon after watering as it can be done without making the soil muddy.

Artichoke

The Globe Artichoke is cultivated for its flower heads, which are used in an undeveloped state, cooked like Asparagus. Plant seed early in spring, three inches apart, in rows one foot apart. When one year old, transplant to rows three feet apart and one foot apart in row. Where the winters are severe protect the plants with leaves or dry litter, to keep the crowns from freezing. **Green Globe.** Pkt. 10c; oz. 35c; lb. \$3.50, postpaid.

Asparagus

As Asparagus seed germinates very slowly, it is advisable to pour hot water over it. When cool, pour off the water and treat it again with hot water. Sow seed quite early in spring, in a bed of light, rich, well-manured soil, in drills one foot apart and two inches deep. When the plants are well up, thin to about one-inch apart. When the plants become withered, cut them down, and spread well-rotted stable manure two inches deep over the bed. Let the plants remain in the seedbed until they are about to grow, early in spring. The subsoil of the permanent bed should be dry, and if not so, it must be well drained. It should be dug thoroughly at least two and a half feet deep, and mixed with plenty of well rotted manure. For private garden use set the plants in rows two feet apart, and about a foot apart in the row, with crowns four inches below the surface, and spread the roots. For field culture the rows should be six feet apart and two feet apart in the rows. Before winter cover the transplanted beds with about four inches of manure, and fork it in the next spring, being careful not to injure the roots. In autumn, cut the ripe tops and burn the refuse. One pound of seed will produce plants sufficient for an acre, and one ounce of seed will sow a drill fifty feet long.

Conover's Colossal.

The standard variety. A mammoth green sort of the largest size and of good quality. Produces more stalks to the root than any other kind. Pkt. 5c; oz. 10c; 1/4 lb. 20c; lb. 60c, postpaid.

Palmetto.

A favorite with truckers. Not quite as prolific as Conover's, but a little earlier and makes larger stalks. Pkt. 5c; oz. 10c; 1 lb. 20c; lb. 65c, postpaid.



CONOVER'S COLOSSAL.

Beans

CULTURE.—Plant all varieties of beans after danger of frost is past. Bush beans may be planted about 2 inches deep in drills from 24 to 30 inches apart according to the variety and richness of the soil, placing the seed 3 inches apart or 4 seeds in hills 24 inches apart each way.

Cultivation should be frequent until the plants begin to bloom, but only when the foliage is dry, for if disturbed when wet the vines will rust.

Pole beans require fertile soil. Plants six seeds 2 inches deep in hills around poles 8 feet high, set firmly in the ground.

The poles should be set about 3 feet apart each way and the seeds placed in the ground in a circle about 6 inches from the base of the pole. Cultivate same as for bush beans.

Dwarf, Bush or Snap Beans.

Yellow or Wax-Podded Varieties

Pencil Pod Black Wax.

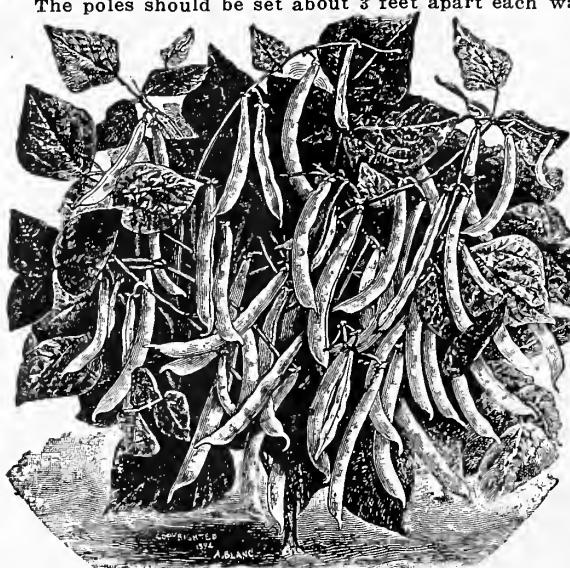
The best quality round pod early Wax Bean. It has a bushy growth, height 15 inches; is extremely productive. Pods are straight, round, six to seven inches long; thick, absolutely stringless, of fine flavor; color medium yellow. The seed is black, an all round high quality sort for the kitchen garden or the market gardener. Pkt. 10c; lb. 35c, postpaid. By Express or Freight, per lb. 25c; 10 lbs. \$2.00.

Improved Golden Wax.

Moderately early, of vigorous, bushy growth, rust-proof. A reliable heavy cropper, whether sown in spring, summer or early fall. Pods long, thick and solid, absolutely stringless, of golden yellow color. A standard sort for both home and market garden use.

Pkt. 10c; lb. 35c, postpaid.

By Express or Freight, lb. 25c; 10 lbs. \$2.00.



IMPROVED GOLDEN WAX.

BEANS—Continued.



DAVIS WAX.

Davis Wax or Ventura Wonder.

THIS IS THE MOST HARDY AND PRODUCTIVE BUSH WAX-PODDED BEAN IN CULTIVATION.

The pods are very long, white, straight and handsome. The vine is rustless and very vigorous, bearing near the center many clusters, some of which extend above the foliage. When young, the pods are very brittle, crisp and tender. The dry beans are kidney-shaped, clear, white and excellent for baking. **ONE OF THE BEST FOR SHIPPING AS SNAP BEANS**, and of the greatest value for either the market or the home garden. The length, perfect shape and fine color of the pods, and the clear, white seed, make this **ONE OF THE BEST FOR CANNERS**.

It is just what they want—a long, straight, clear white pod, which does not discolor in canning.

Pkt. 10c; lb. 35c, postpaid.

By Express or Freight, lb. 25c; 10 lbs. \$2.00.

Bush or Snap, Green Pod Varieties

Earliest Improved Round Pod Red Valentine.

This variety is usually ready to pick in 34 days after planting. The pods are round, very thick and fleshy, with very little strings, of finest quality and unequalled in uniformity of ripening, which latter fact, combined with its earliness, makes it one of the most profitable sorts for the gardener. Pkt. 10c; lb. 35c, postpaid. By Express or Freight, lb. 25c; 10 lbs. \$2.00.

Stringless Green Pod.

In point of earliness it ranks among the first; in quality it is excelled by none, and in bearing ability it stands without a rival. It is unquestionably the greatest green pod bean to date. The pods are full, fleshy and nearly straight, and are borne in abundance through a long season, beginning early. They are $5\frac{1}{2}$ to $6\frac{1}{2}$ inches in length, light green in color, very tender, and of highest and best flavor. They remain long in edible condition, and the plant or bush bears continuously for weeks. This bean is unexcelled for home use, and will be found very profitable for market; it has already taken great hold with market gardeners, on account of its heavy cropping ability. Pkt. 10c; lb. 35c, postpaid. By Express or Freight, lb. 25c; 10 lbs. \$2.00.

Broad Windsor.

(ENGLISH DWARF OR BROAD.) This is entirely distinct from the common, or French bean. The large, coarse pods are borne on stout plants, which are coarser, more erect and less branched than those of the French bean. Pkt. 10c; lb. 30c, postpaid. By Express or Freight, lb. 20c; 10 lbs. \$1.75.

White Tepary Bean.

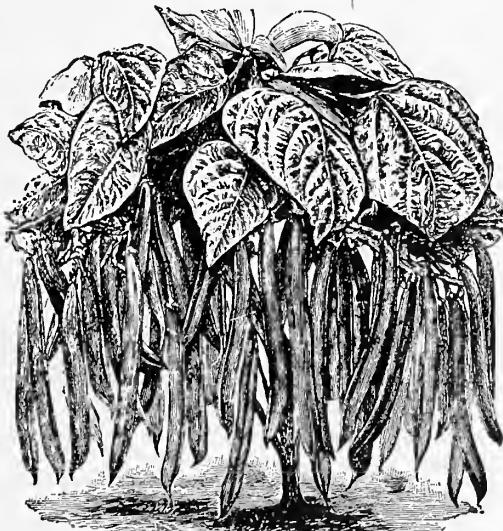
A Bean For The Arid Country

Think of what it means to be able to raise beans in the hottest and driest sections, in places where all other beans fail completely. That is just exactly the record that the Tepary Bean has made, when planted in Arizona alongside of other commercial beans. **Teparies BORE AND THE OTHERS EITHER DIED OUT COMPLETELY OR WHEN IRRIGATED YIELDED A CROP OF ONLY SEVEN PER CENT AS GREAT.** Tepary Beans are drouth resisting in the extreme and are quick maturing, there being less than seventy days from seeding to harvest.

The Tepary is a small white bean, smaller than the Navy, better flavored, more resistant to disease and to drouth; it belongs to an entirely distinct family of beans.

Tepary is one of the easiest known crops to produce. With a minimum amount of rainfall, and without irrigation, the vines grow vigorously and bear heavily.

The vine is medium size, with many branches, some of them bearing short runners. Leaves small and pointed; pods small but numerous; seed white, round-oval and very small. Sow fifteen pounds of seed to the acre. Pkt. 10c; lb. 30c, postpaid. By Express or Freight, lb. 20c; 10 lbs. \$1.50.



STRINGLESS GREEN POD.

BEANS—Continued.

Burpee's Improved Bush Lima.

This new variety may be regarded as the largest and best of the large seeded Bush Lima Beans. The pods are larger than the older varieties and contain beans which are proportionately thicker and longer than those of the older varieties. The quality is excellent. Pkt. 10c; lb. 30c, postpaid. By Express or Freight, lb. 20c; 10 lbs. \$1.50.

Henderson's Bush Lima.

While the beans are small (being of the Sieva or Sewee type, known in the South as "butter beans") yet they are ready for the table earlier than the Large Lima, and the little pods, growing in clusters, are plentiful. The compact, dwarf bushes are of hardy growth and very prolific. Pkt. 10c; lb. 30c, postpaid. By Express or Freight, lb. 20c; 10 lbs. \$1.50.

Pole or Running Beans

Lazy Wife.

So named on account of the large number of pods it affords, making it easy to obtain a supply. One of the best varieties for snaps of the late green-podded pole beans. The pods grow in large clusters, are five to seven inches long, broad, thick, fleshy, and entirely stringless. They have a rich, buttery flavor. The dry beans, which are white, are fine for winter use. Pkt. 10c; lb. 35c, postpaid. By Express or Freight, lb. 25c; 10 lbs. \$2.00.



LAZY WIFE.

Mammoth Podded Horticultural.

Similar in general character to the London Horticultural, but larger in every way. The mammoth pods are striped and splashed with exceedingly brilliant crimson. The beans, when fit for use, are of immense size and of the finest quality, and when dry are colored and marked in the same way as the pods.

Pkt. 10c; lb. 30c, postpaid. By Express or Freight, lb. 20c; 10 lbs. \$1.75.

Old Homestead or Kentucky Wonder.

This most popular variety is an improved large podded strain of the Southern Prolific. The pods, usually seven inches or more in length, are so fleshy that they are greater in width than in breadth, being deeply creased or "saddle-backed." They are solidly meaty, entirely stringless, and of finest quality. If kept gathered as they mature, the vines will continue to bear to the end of the season.

Pkt. 10c; lb. 35c, postpaid. By Express or Freight, lb. 25c; 10 lbs. \$2.00.

Burgher's Stringless or White Seeded Kentucky Wonder.

A pole bean of great merit, claimed to be a heavier producer and more resistant to mildew than the common Kentucky Wonder, of which it has a similar growth and appearance except that it has white seeds. It bears well into the Fall. Pkt. 10c; lb. 35c, postpaid. By Express or Freight, lb. 25c; 10 lbs. \$2.00.

Scarlet Runner.

An old favorite; used both as string and shelled beans. Vines strong, rapid growers, often used for ornamenting porches and trellises. Flowers brilliant scarlet. Blooms from early in summer until late in fall.

Pkt. 10c; lb. 50c, postpaid.

Please Notice—We do not pay the charges on Beans, Peas or Sweet Corn at prices quoted when to go by Express or Freight.

Beets

Culture.—The best results are obtained on a deep, rich, sandy loam. If wanted very early sow in hot-beds and transplant, cutting off the outer leaves. For general crop sow as soon as the ground will permit in drills eighteen inches apart and thin out to three inches in the row. For winter use, the turnip varieties may be sown in June, and the beets may be kept by storing in a cellar and keeping covered with sand, or sandy soil, to prevent wilting, or they may be kept outdoors in pits such as are used for apples and potatoes. One or two ounces, or single packets, of two or three sorts, will give a good supply for a large family. It is best to sow in freshly prepared soil, which should be pressed firmly over the seed.



Extra Early Egyptian Blood Turnip.

The best variety for forcing, and excellent for first early crop out of doors, being very early, with small top. Leaf, stems and veins dark red, leaf dark green, dotted with red, roots very dark red, rounded on top, but flat beneath, with very small tap roots.

Pkt. 5c; oz. 10c; 1 lb. 30c; 1b. 90c, postpaid.

Early Eclipse Blood Turnip.

Tops small, dark purplish-green, shading to lighter color outside of leaves. Roots nearly globular, with a small tap root and very small collar. Flesh dark red, zoned with a lighter shade, very sweet, crisp and tender, especially when young.

Pkt. 5c; oz. 10c; 1 lb. 30c; 1b. 90c, postpaid.

Model Globe.

Extremely early, of perfect globe form and finest quality. Smooth and of the deepest blood-red color. Quickly attain a good size. A great favorite with planters on account of its superlative excellence.

Pkt. 5c; oz. 10c; 1/4 lb. 30c; 1b. \$1.00, postpaid.

Improved Long Dark Blood.

Tops large, necks small, leaf stems and veins red, leaf green, roots large, tapering, growing even with the surface, flesh dark red zoned with lighter shade, very tender and sweet, and remaining so when kept till spring.

Pkt. 5c; oz. 10c; 1 lb. 25c; 1b. 80c, postpaid.

Bastian's Half Long Blood.

This is an entirely distinct variety and by far the best for winter use. The flesh is rich dark red, very sweet, crisp and tender, never becoming woody, even in portions above the ground, and retains its good quality longer than other sorts.

Pkt. 5c; oz. 10c; 1 lb. 30c; 1b. 90c, postpaid.

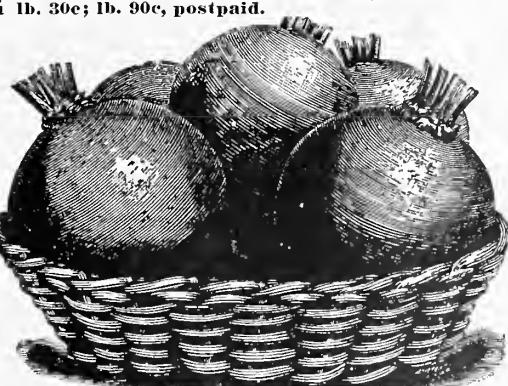
Edmand's Early Blood Turnip.

A market gardener's strain; regular in shape, round, with very small tap-root; flesh a deep blood-red, sweet and tender. Pkt. 5c; oz. 10c; 1/4 lb. 30c; 1b. 90c, postpaid.

Detroit Dark Red Blood Turnip.

Long experience has shown this variety to be the best deep red turnip beet, not only for market gardeners, but for home use. It is also by far the best for canning, making a strikingly handsome product, much superior to that obtained from any other variety. Its small, upright-growing tops, early maturing, and the splendid shape and color of the roots make it popular with every one who plants it. Tops small, upright-growing, so that the rows may be close together; leaf stems and veins dark red, blade green; roots globular or ovoid, peculiarly smooth; color of skin dark blood-red; flesh bright red, zoned with a lighter shade; very crisp, tender and sweet, and remaining so for a long time.

Pkt. 5c; oz. 10c; 1 lb. 30c; 1b. \$1.00, postpaid.



DETROIT DARK RED BLOOD TURNIP.

Large Ribbed Swiss Chard, Silver or Sea Kale Beet.

We recommend all our customers to try this distinct vegetable, which is superior to the common beet for greens; if sown at the same time it will be fit for use before it. Later the plants form broad, flat, beautiful wax-like stems, which are delicious as beets or pickled.

Pkt. 5c; oz. 10c; 1 lb. 30c; 1b. 90c, postpaid.

BEETS—Continued.

Mangel Wurzel For Stock Feeding.

Mangel Wurzels are of special value to the stockman and dairyman. The roots are juicy, sweet and refreshing, act as a mild laxative, keep the cattle in good health, thus tending to produce flesh and increasing the flow of milk. The owner of even one or two cows should grow a sufficient quantity of Mangels to provide fresh food in winter when green food is unobtainable. For field culture the rows should be wide enough to admit the horse cultivator, and the roots not nearer than one foot in the row. Sow five or six pounds of seed to the acre.

Improved Mammoth Long Red.

An improvement on the old variety. The roots are very large, uniformly straight and well formed, proportionately thicker, and are deeper colored than the common sort, and with smaller tops. We know our stock of this variety will produce the largest and finest roots which can be grown, and that it is vastly superior to many strains of the same sort offered under other names, such as Norbitan Giant, Colossal, Monarch, etc. Pkt. 10c; lb. 45c, postpaid. By Express or Freight, lb. 35c; 10 lbs. \$3.00.

Orange Globe.

We think this one of the best varieties of Mangel Wurzel grown for stock feeding. It has exceedingly small tops and few leaves; leaf stalks and blades green; roots medium sized, uniformly globe-shaped, having a very small tap and few side roots; color of skin, deep orange yellow; flesh, white and of excellent quality. The roots grow almost entirely above ground, making them admirably adapted to shallow ground and very easy to harvest.

Pkt. 10c; lb. 45c, postpaid. By Express or Freight, lb. 35c; 10 lbs. \$3.00.

Golden Tankard.

Tops comparatively small, with yellow stems and mid-ribs; neck very small; roots large, ovoid, but filled out at top and bottom, so as to approach a cylindrical form. Flesh yellow, zoned with white. A great improvement and worthy of use on every farm.

Pkt. 10c; lb. 45c, postpaid. By Express or Freight, lb. 35c; 10 lbs. \$3.00.

Sludstrup Barres.

Long reddish yellow, grows well above ground, easy to pull. It is considered by the Danish growers to be the best Mangel in the world. Pkt. 10c; lb. 50c, postpaid. By Express or Freight, lb. 40c; 10 lbs. \$3.50.

Sugar Beets.

When the Sugar Beet is planted for a sugar crop, from six to eight pounds of seed will be required for an acre. Seed may be sown in drills twenty to thirty inches apart. When beets are up two or three inches high, they should be thinned out so as to stand from six to eight inches apart. Discontinue cultivation after formation of roots has commenced. Although Sugar Beets are grown principally for sugar-making and for stock-feeding, they are very desirable for table use, being more tender, sweeter, and of better flavor than any of the sorts grown for that purpose. Everyone should try them.

Klein Wanzleben Sugar.

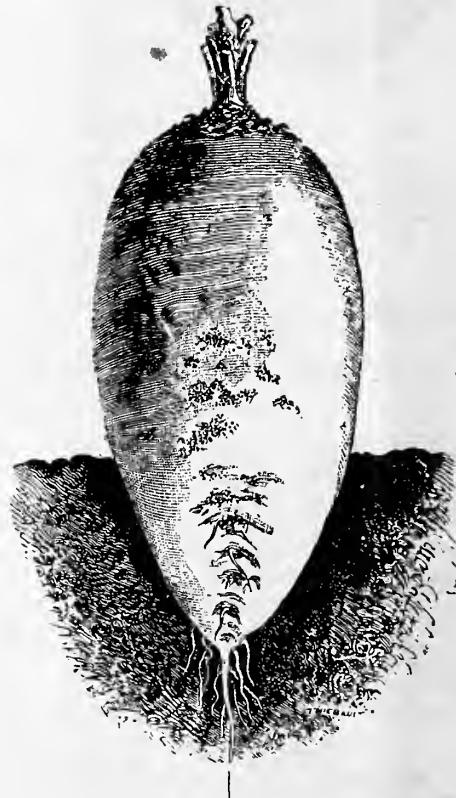
Cultivated almost exclusively for sugar, and yields from twelve to eighteen tons per acre. The beet grows below the surface. The green leaves are rather large and spreading, with wavy edges. It gives good returns in any ordinary soil. Probably the best sort for the experimenter to use.

Pkt. 10c; lb. 50c, postpaid. By Express or Freight, lb. 40c; 10 lbs. \$3.50.

Giant Feeding Sugar Beet or Rose Half Sugar Mangel.

This magnificent Sugar Beet while giving nearly as large a yield of easily grown and harvested roots as a crop of Mangels, supplies a food of very much higher nutritive value, the roots for feeding purposes being really more valuable, pound for pound, than those of the very best strains of Sugar Beet, and the yield under equally favorable conditions being more than double. The roots grow partly out of the ground and because of this and their shape the crop can be harvested and stored at less expense than any other root crop. We are certain that every one who plants this variety and grows it with care will be much pleased with the crop. Every farmer should try it.

Pkt. 10c; lb. 45c, postpaid. By Express or Freight, lb. 35c; 10 lbs. \$3.00.



GIANT FEEDING SUGAR BEET.



Brussels Sprouts

Sow seed in early spring and treat like winter cabbage. One ounce will produce about 5,000 plants. The plants which are very hardy, grow two or three feet high, and produce from the sides of the stalk numerous little sprouts which resemble very small cabbages, one or two inches in diameter. The leaves should be broken down in the fall, to give the little heads more room to grow. They should be treated in all respects like winter cabbage or kale.

LONG ISLAND IMPROVED. Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 45c; lb. \$1.50, postpaid.

Cabbage

Culture for Early Cabbage. Seed of the early varieties should be sown $\frac{1}{4}$ of an inch deep in a greenhouse, hot-bed, or in boxes in the house, about 6 weeks before the plants are needed, for planting out.

If, when the second leaves appear, the plants can be transplanted, spacing them 3 inches apart, better and more hardy plants will be obtained.

As soon as the soil can be worked in the spring the plants should be removed to the open field and set in rows 2 feet apart each way. **LONG ISLAND IMPROVED.** Cultivate occasionally to keep out the weeds and preserve the moisture in the soil until the plants shade the ground.

Culture for Late Cabbage. The seed may be sown in rows 1 foot apart or broadcast in the garden, about the middle of May, and the plants set in the field the latter part of June, or it may be planted in hills 30 inches apart, 4 to 5 seeds to the hill, in the field where the cabbages are to grow, thinning to one plant in a hill when the plants are 3 to 4 inches high.

Cultivation must begin as soon as the plants are set in the field, or as soon as seed sown in the field is up and continued as long as it is possible to get through them with a horse cultivator without doing injury to the plants.

Where the seed is sown in the field, whether it be in rows or in hills, it should be covered with $\frac{1}{4}$ of an inch of soil and this soil firmed well to insure rapid germination.

One-half lb. seed sown in a bed will produce plants for one acre.

Early Winnigstadt.

One of the best for general use, being very hardy and sure to head, forming a hard head when most sorts fail.

Those who have failed with other kinds can hope to succeed with this. It seems to suffer less from the cabbage worm than any other sort.

Plant is very compact, with short, thick leaves.

Heads regular, conical, very hard, and keep well both summer and winter.

It is the hardest, not only as regards frost, but will suffer less from excessive wet, drought, insects or disease than any other second early sort, and will give a fair crop of heads when others fail.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 40c; lb. \$1.25, postpaid.



EARLY WINNIGSTADT.

All Head Early or Faultless.

For the amateur who plants but one variety of Cabbage this is the one he should select, as for all purposes, it answers the requirements better than any other sort. It matures heads of large size, uniform, handsome in appearance, and of a quality which is not equaled. The outer leaves are few and close plantings may be made. Among kraut growers it is the most popular variety for the largest tonnage possible may be raised to the acre.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 60c; lb. \$2.00, postpaid.

Danish Summer Ballhead.

The Danish Summer Ballhead Cabbage is taking the place among the early varieties that the Danish Ballhead holds among the later sorts. It is a second early, extremely hard, long-keeping and of superb quality, and on light soil it does particularly well, being a sure header. It resembles the Winter Ballhead quite closely, excepting that it is smaller and slightly flat on top. It has traces of curliness on the outside leaves and delicate flavor that suggests Savoy blood. Color is light green, very small with fine ribs in the leaves. Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 45c; lb. \$1.50, postpaid.

CABBAGE—Continued.



EARLY SUMMER.

Early Summer.

This variety matures ten days or two weeks after Wakefield, with heads almost double the size of that very early sort. It is one of the best of the large early cabbages, of round flattened form and very compact and solid. It is a valuable variety for the market gardener. One point in favor of this cabbage is that on account of its short outer leaves it can be planted almost as closely as the Wakefield, or from 11,000 to 12,000 plants to the acre. The shape of this cabbage is remarkably uniform.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 45c; lb. \$1.50, postpaid.

Early Dwarf Flat Dutch.

The type is so pronounced and the name so widely known that it would be hard to displace it, with even a better sort. It continues to succeed everywhere. It is an excellent second early cabbage, producing large, solid heads of uniform shape, flattened on top, and always making a handsome appearance.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 45c; lb. \$1.50, postpaid.

Early Jersey Wakefield.

The earliest and hardest heading of extra early Spring Cabbages. Most gardeners depend upon it for the bulk of their extra early crop. Our stock is grown and selected with the greatest care, and there is none better, and there are few as good. Heads conical, very compact, solid and of excellent quality. The thick, stout leaves and compact habit make it the best for wintering over and very early setting. Pkt. 5c; oz. 20c. $\frac{1}{4}$ lb. 50c; lb. \$1.75, postpaid.

Succession.

The Succession Cabbage follows ten days behind the Early Summer, and differs from that variety in forming heads at least one-third heavier, while at the same time it can be planted nearly as close, as its outer leaves are unusually short and compact for a cabbage forming such a large and heavy head. Although this variety will be largely grown to come in for midsummer use, it will also be most valuable as a fall or winter variety, as its firm, solid heads make it an excellent keeper.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 40c; lb. \$1.25, postpaid.

Copenhagen Market.

The earliest large round-headed cabbage yet introduced. Head exceptionally large for so early a variety, very solid and of most excellent quality. Plant vigorous but compact, with short stem and few outer leaves which are of rather upright growth. Leaves medium light green, nearly round, comparatively thick and smooth. A most excellent sort, both for the home garden and market gardening trade.

Pkt. 5c; oz. 35c; $\frac{1}{4}$ lb. \$1.25; lb. \$4.00, postpaid.



SUCCESSION

Mammoth Rock Red.

The surest heading Red Cabbage and much better than stock offered as "Red Drumhead." The plant is large, with numerous spreading leaves. The head is large, round, very solid and of deep red color. Ninety-eight per cent of the plants will form extra fine heads.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 60c; lb. \$2.00, postpaid.

CABBAGE—Continued.

SUPERIOR PREMIUM LATE FLAT DUTCH.

Superior Premium Late Flat Dutch.

The largest and best of the late market sorts. The plants are very vigorous and hardy. The leaves are very large and broad; the stem of moderate height; the head large and very solid. A hardy and very sure heading sort. A thousand plants can be depended upon to produce from 950 to 1,000 large, oval, solid heads of splendid quality, which will keep in the best condition for a long time. Particularly desirable for those who wish to raise large quantities of cabbage for fall shipment.

Pkt. 5c; oz. 15c; 1 lb. 40c; lb. \$1.25, postpaid.

Louisville Short-Stem Drumhead.

This is extremely uniform in heading and dwarf in growth, so that the largest number of heads can be raised on a given area. The heads appear to rest on the surface of the soil. It grows with little outer foliage, the leaves all folding in closely about the head, which is extra hard. With good cultivation heads attain a weight of twenty to thirty pounds, and are of the finest quality.

Pkt. 5c; oz. 15c; 1 lb. 40c; lb. \$1.25, postpaid.

Danish Ballhead.**Heads Hard, Solid, Tender and Crisp. The Leading Sort.**

No Cabbage of late introduction has attained such great popularity, or given such general satisfaction as Danish Ballhead. It commands a higher price in the market than any other variety. It is remarkable for the solidity of its heads and long-keeping qualities. The heads are of medium size, with few outer leaves, admitting of close planting; exceedingly fine-grained, hardest of all, tender, crisp, solid, with no waste heart. Will average six pounds per head. Pkt. 5c; oz. 15c; 1 lb. 45c; lb. \$1.50, postpaid.

Surehead.

This famous cabbage produces large, round, flattened heads of the Flat Dutch type, and is remarkable for its certainty to head. It is all head, and sure to head, even under unfavorable conditions. The heads are remarkably uniform, very hard, firm and fine in texture, and ordinarily weigh from ten to fifteen pounds each. It is very sweet flavored, has but few loose leaves, keeps well, is good for shipping, and is just the variety and quality to suit market gardeners, farmers and all lovers of good cabbage.

Pkt. 5c; oz. 15c; 1 lb. 45c; lb. \$1.50, postpaid.

Danish Roundhead.

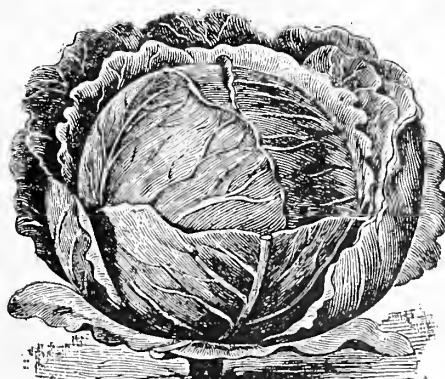
An earlier, shorter stemmed, improved strain of the Danish Ballhead Cabbage. The heads are hard and very solid and mature about two weeks in advance of the Ballhead. They also average a little larger and heavier. The inner leaves are blanched almost pure white, are of sweet flavor, crisp and tender. It is less liable to blight and shows vigorous growth even in the hot summer.

Pkt. 5c; oz. 15c; 1/4 lb. 45c; lb. \$1.50, postpaid.

Chinese Cabbage.

This delicious vegetable should be more generally used. It is more easily grown than the ordinary cabbage, and when boiled with meat, it is much better than either cabbage or turnips. As a salad or cold slaw it is excellent. Every home garden should have a plot of Chinese cabbage. Grow it exactly as you do lettuce.

Pkt. 10c; oz. 75c, postpaid.



DANISH ROUNDHEAD.

Improved American Savoy.

Decidedly the peer of all Savoy Cabbage, either for market or kitchen garden, and a reliable header. The heads are large, solid, and possess a fine delicate flavor. The curled and crimped leaves are of a dark rich green color. Pkt. 5c; oz. 15c; 1 lb. 50c; lb. \$1.75, postpaid.

"PURITY SEEDS" Have Stood The Test.

Carrots

For the Home and Market Garden

For garden culture, sow in drills sixteen to eighteen inches apart, covering the seed half an inch to an inch deep. For field culture, sow in drills from twenty to thirty inches apart, and when plants are one to two inches high thin out from three to eight inches apart in the rows, according to the variety. One ounce will sow 100 feet of drill; three to four pounds to an acre.



CHANTENAY OR MODEL.

Early Scarlet Horn

A variety of carrot long and favorably known to all growers. It is not large, but is often used for early crop. It is sometimes used for forcing. Considered by many people to be the best early table sort. The flesh is fine grained and the color a deep orange. It has small tops, and grows well in shallow soil. It matures 8 to 10 days sooner than Long Orange.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Chantenay, or Model.

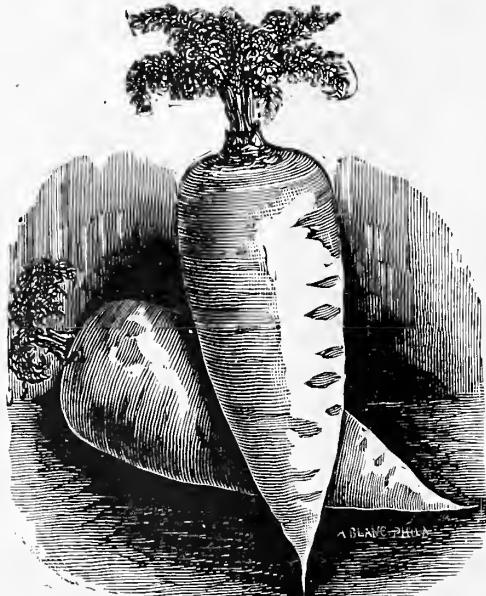
This variety is a very productive one. It has an extra large shoulder, is easily dug, and is desirable in all respects. It is a stump-rooted sort, very smooth, fine in texture and of a beautiful, rich orange color. For table use it is by many considered to be the best of all, both on account of shape and quality. The flesh, when cooked, is very tender.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Guerande, or Ox Heart.

Tops small for the size of the roots, which are comparatively short, but often reach a diameter of seven inches, terminating abruptly in a small tap root. Flesh bright orange, fine grained and sweet. This is a desirable variety for soil so hard and stiff that longer growing sorts would not thrive on it. When young, excellent for table use, and when mature equally good for stock.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.



IMPROVED SHORT WHITE.

Danvers, Half Long.

Grown largely on account of its great productiveness and adaptability to all classes of soil. Tops medium sized, coarsely divided. The smooth and handsome roots are deep orange, of medium length, tapering uniformly to a blunt point, flesh sweet, crisp, tender and of a deep orange color. Although the roots of this variety are short, they produce as large a bulk as the longer field sorts and are more easily harvested.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Improved Long Orange.

The most popular of the older sorts for farm use on mellow soil. An improvement obtained by years of careful selection of the best formed and deepest colored roots of the old Long Orange. Roots are comparatively shorter than the Long Orange, and smoother, but so uniform and true that the bulk of the crop will be greater.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 85c, postpaid.

Improved Short White (Vosges).

For a field Carrot this is unexcelled. The roots are short, very heavy at the shoulder, tapering to a point, and therefore easily harvested. Especially suited to shallow soils. Enormously productive.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 80c, postpaid.

Cauliflower

Culture.—For early use, seed should be sown $\frac{1}{4}$ of an inch deep in a greenhouse, hot-bed or in boxes in the house, about six weeks before the plants are needed for planting out.

If, when the second leaves appear, the plants can be transplanted, spacing them three inches apart, better and more hardy plants will be obtained.

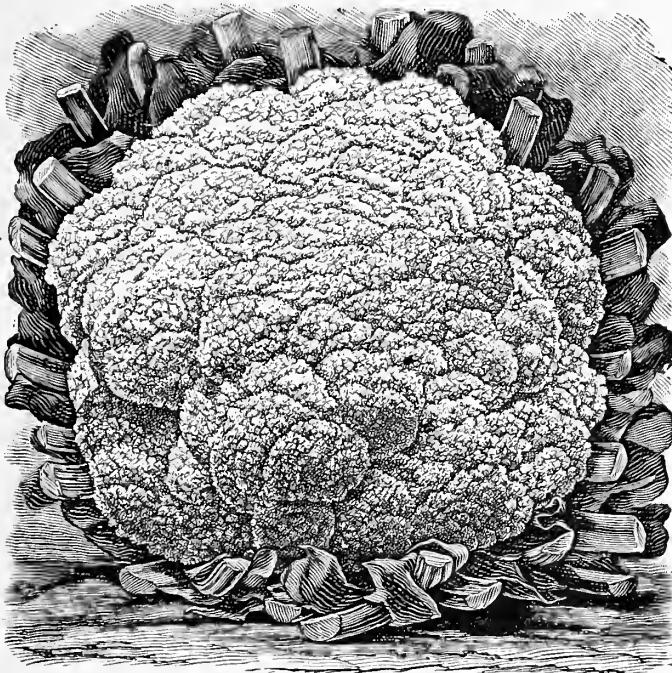
As soon as the soil can be worked in the spring the plants should be removed to the open field and set in rows two feet apart each way. Cultivate occasionally to keep out weeds and preserve the moisture in the soil until the plants shade the ground.

For late use sow seed in beds about May 10th and when the plants are large enough remove to the garden, setting them from two to two and a half feet each way.

Cultivation must begin as soon as the plants are set in the field, and be continued as long as it is possible to get through them with a horse cultivator without doing injury to the plants.

As soon as the heads begin to form, tie the leaves together over the head to keep out the light; by this process nice white heads are obtained.

One ounce of seed will produce about 3000 plants.



BEST EARLY SNOWBALL.

Best Early Snowball.

We can recommend the Snowball as one of the earliest and surest heading varieties. Its dwarf habit and short outer leaves allow it to be planted very close—eighteen to twenty inches apart. It is well adapted for forcing under glass throughout the winter and spring. It gives a pure snow-white, medium-sized head. Pkt. 10c; $\frac{1}{4}$ oz. 60c; oz. \$2.00, postpaid.

Erfurt Earliest Dwarf.

This variety will stand the test with any extra early sort. It is very dwarf in habit, producing pure white heads of great solidity and finest quality; quite desirable for forcing or for planting in open ground. For a general all-round market garden variety we can highly recommend the Erfurt strain. Pkt. 10c; $\frac{1}{4}$ oz. 60c; oz. \$2.00, postpaid.

Danish Giant—"Dry Weather."

Its main feature is the fact that it will stand an unusual amount of dry or warm weather and still produce perfect, large solid heads. In districts where heretofore it has been impossible to grow Cauliflower, this fine variety has proven a success. It is ready for market or table about a week later than Extra Early Erfurt. Pkt. 15c; $\frac{1}{4}$ oz. 60c; oz. \$2.00, postpaid.

Celery

Culture.—Celery seed is slow to germinate, and when early plants are wanted it should be sown in a hotbed in February or March, barely covering the seed. When the plants are large enough, transplant into coldframes, one and a half inches apart; water and attend carefully; keep the temperature moderate; and when the weather is suitable, from middle of May till June, transplant into the open ground. For main crop, sow in shallow drills in the open ground, as soon as the soil can be worked. See that the bed is kept well watered. Rolling or pressing in the seed will give more satisfactory results than merely covering it. When the plants are two inches high, thin out to three inches apart in the rows; and when four inches high, cut off the tops to make the plants stocky. The best time to plant is that which will bring the plants to maturity during the cool, moist weather. Never hoe or earth up in moist weather, nor when the plants are wet with dew, as it would cause serious injury. One ounce of seed will produce 4,000 to 5,000 plants.

White Plume.

A variety especially adapted to cultivation by amateurs as its inner stalks and leaves are naturally white, and do not require blanching by the old process of high banking. By tying up the stalks and drawing up the soil with the hoe, the work of blanching is complete; tender, crisp, and of good flavor.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 60c; lb. \$2.00, postpaid.

Evans' Triumph.

This Is by Far the Best of the Late Varieties.

The very large, solid, crisp, tender stalks are not only very beautiful, but of superb quality. When it is possible to secure such pure and well-bred stocks of Golden Self-Blanching, Winter Queen and Evans' Triumph Celery as we offer, there is nothing further to be desired, and every private garden should have them. No wide awake gardener will be without them.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 50c; lb. \$1.75, postpaid.

Golden Self-Blanching.

No Celery Offered Approaches This Variety in Quality, Flavor, Color or Habit of Growth.

Stalk solid, tender and crisp; the delicate cream-yellow color makes it attractive when offered for sale as well as inviting when on the table. The flavor is of the best—rich and nutty. In habit of growth it is dwarf, stocky, uniform in height, and very compact.

Pkt. 10c; oz. \$1.00, postpaid.

Winter Queen.

One of the best winter varieties, and we recommend it especially to market gardeners. It is tall and forms a large bunch. The leaves are light green which blanch to a creamy white. Grows a thick, solid, heavy stalk with a large heart. Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 60c; lb. \$2.00, postpaid.

Giant Pascal.

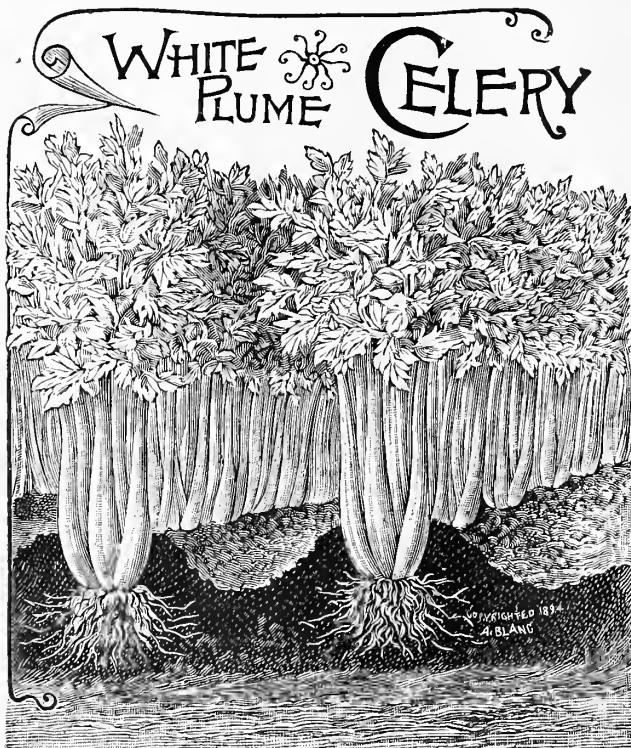
This is a selection from the Golden Self-Blanching Celery. The stalks are very large, thick, solid and crisp. It has a fine nutty flavor, and is free from any trace of bitterness. It blanches with but slight earthing up, retains its freshness a long time after being marketed.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 50c; lb. \$1.75, postpaid.

Vogeler's Ideal.

A splendid new variety, having the long keeping qualities of the winter celery and blanching easily, like the Golden Self-Blanching. Hardy, vigorous and of fine quality. The heart is very large, creamy white, brittle and delicious. Very popular with the Chinese gardeners.

Packet, 5 cents; oz. 25 cents; lb. \$2.00.



Celeriac

Or Turnip-Rooted Celery.

Culture.—Sow the seed at the same season and give the same treatment as common celery. Transplant the young plants to moist, rich soil, in rows two feet apart and six inches apart in the row. Give thorough culture. As the roots are the edible portion of this vegetable, it is not necessary to earth up or "handle" it. After the roots have attained a diameter of two inches or over they will be fit for use. To keep through winter, pack in damp earth or sand and put in the cellar, or leave out of doors, covering with earth and straw, like beets or carrots.

Large Smooth Prague, or Apple Shaped.

An improved form of Turnip-Rooted Celery, producing large and smooth roots, which are almost round, and with very few side roots. Plants vigorous, with large, deep green foliage.
Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 60c; lb. \$2.00, postpaid.

Chicory

Sow Chicory seed as early in the spring as the ground can be worked, in drills half an inch deep and fifteen inches apart, and in mellow soil. The after-culture is the same as for carrots. In the autumn the plants will be ready for blanching, when it is used as a salad. The dried roots are used as a substitute for and an adulterant of coffee. One ounce is sufficient for 100 feet of drill.

LARGE-ROOTED OR COFFEE. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Chives

Chives are perfectly hardy perennial plants of the onion type. They are grown for the small leaves which come up very early in the spring and give a mild onion flavor to food in which they are placed. The tops may be cut off close to the ground as desired.
Pkt. 10c; $\frac{1}{4}$ oz. 25c; $\frac{1}{2}$ oz. 45c; oz. 75c, postpaid.

Collards

A variety of cabbage known in different sections as "Cole," "Colewort" or simply "Greens." It is extensively used in the South, where it continues in luxuriant growth all winter.

Georgia, Southern, or Creole.

We offer the true white or green stemmed sort so extensively used in the South, where it furnishes an abundance of food for man and beast. Forms a large, loose, open head, or a mass of leaves on a tall stem. Freezing does not injure but rather improves their quality. Sow thick in drills, in rich ground, transplanting when four inches high, or sow in drills where the plants are to remain, and thin to two or three feet apart in the row when of proper size.
Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.



CORN SALAD.

Cress—Curled or Pepper Grass.

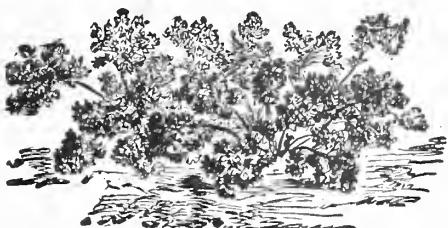
This small salad is much used with lettuce, to the flavor of which its warm, pungent taste makes a most agreeable addition. The seeds should be sown in drills about sixteen inches apart on very rich ground, and the plants well cultivated. It may be planted very early, but repeated sowings are necessary to secure a succession. Keep off insects by dusting with Pyrethrum Powder.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.

Corn Salad—Fetticus or Lamb's Lettuce.

This small salad is used during the winter and spring months as a substitute for lettuce and is also cooked and used like spinach. In warm weather the plants will mature in four to six weeks. Sow the seed in shallow drills about one foot apart, during August and September. If the soil is dry it should be firmly pressed over the seed in order to secure prompt germination. On the approach of severe cold weather cover with straw or coarse litter. The plants will also do well if the seed is sown very early in the spring, and like most salad plants, are greatly improved if sown on very rich soil; indeed, the ground can scarcely be made too rich for them.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.



CRESS.

Corn—Sweet or Sugar

Culture.—A rich, warm, alluvial soil is best, but excellent sweet corn can be raised on any good ordinary soil if it is deeply and thoroughly worked before planting. Give frequent and thorough, but shallow, cultivation, until the tassels appear.

Mammoth White Cory.

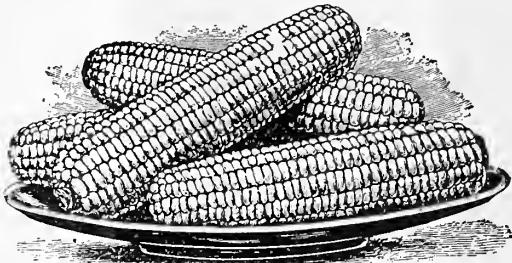
An excellent sort. In fact our selection of seed stock and careful growing of this strain make it the largest and best extra early in our list. The stalks are large, while each stalk bears two or more large, fine shaped ears, twelve-rowed; remarkable for its good quality for so early a sort. All gardeners who cater to the best trade should plant this variety.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.00.

Crosby's Early.

A most excellent early variety of fine quality. Ears five and one-half to six and one-half inches long, fourteen-rowed or more, with short nearly square grains which are very white, sweet and tender. Plants about four and one-half feet high. This is the sort so largely grown in Maine for canning and it is the use of this variety rather than any peculiarity of soil that has given Maine sweet corn its reputation for quality.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25.



CROSBY'S EARLY.

Golden Bantam.

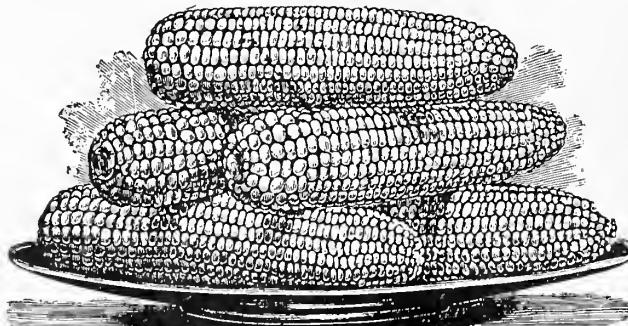
An early sweet corn with golden yellow grain, very tender and of excellent quality. Ears eight-rowed, six to seven inches long and of the medium size found most suitable for the table. The flavor is exceptionally rich and delicious. Height four to five feet.

Pkt. 10c; lb. 30c, postpaid. By Express or Freight, lb. 20c; 10 lbs. \$1.50.

Early Minnesota.

This old and deservedly popular variety is one of the best early sorts for the market garden. Stalks four to five feet high, with no suckers, and bearing one or two ears well covered with husks; ears long, eight-rowed kernels very broad, sweet and tender, not shrinking much in drying.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.00.



Early Mammoth Sugar.

This tall-growing sweet corn has not only the largest ears, but is also one of the very sweetest known. It is particularly good for canning purposes, and is an excellent sort for the garden.

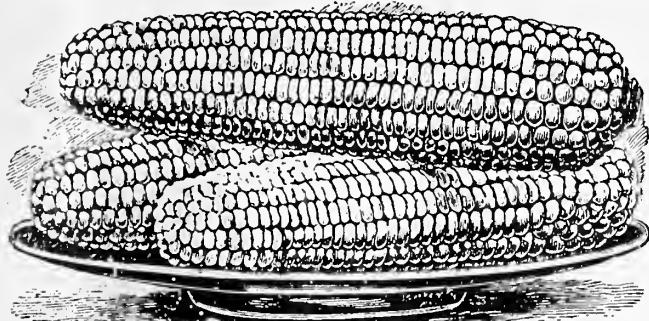
Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25.

EARLY MAMMOTH SUGAR.

Excelsior.

A well known sort, extensively grown for market and canning purposes; also used throughout New England in their famous clam-bakes. It is remarkably sweet, and wonderfully productive.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25.

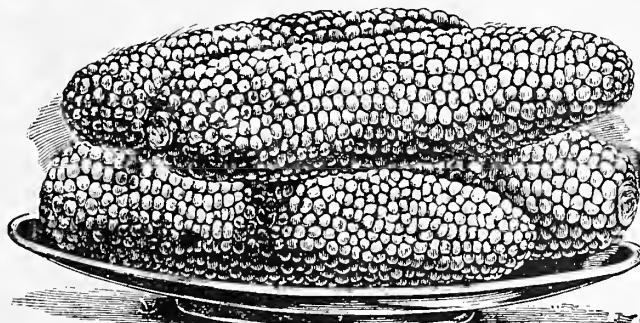
CORN—Continued.**Stowell's Evergreen.**

STOWELL'S EVERGREEN.

**Country Gentleman,
or Improved Shoe Peg.**

This is a midseason corn. Ears of quite large size, and frequently three on a stalk. Grains irregularly set on cob. Cob remarkably small, giving great depth to the kernel. For delicious flavor and sweetness we do not know of anything that can surpass this variety. We recommend it especially to private gardeners, or for choice retail trade.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25.



COUNTRY GENTLEMAN, OR IMPROVED SHOE PEG.

Field Corn

A ton of well cured corn fodder is worth, if well used, the price of a ton of hay. Eight to ten quarts per acre in hills; one bushel in drills; two bushels if sown broadcast, are required per acre.

Minnesota White Flint.

This is a very early 8-10-rowed White Flint Corn, remarkable for its long ears, which are 14 to 16 inches long, with small cobs. It is an extra heavy yielder; each stalk will bear two and three good-sized ears. Lb. 20c, postpaid. By Express or Freight, lb. 10c; 10 lbs. 50c; 25 lbs. \$1.00; 100 lbs. \$3.75.

Australian White Flint (90 days).

The earliest and surest variety. Will endure more drouth and cold than any other variety known. Grows to a height of six to ten feet. Ears varying from eight to ten inches long. Usually eight to ten rowed, one to two ears on stalk. Lb. 10c, postpaid. By Express or Freight, lb. 10c; 10 lbs. 65c; 25 lbs. \$1.25; 100 lbs. \$4.50.

King of the Earlies.

The originator says: "This is the earliest and finest Dent Corn—bright orange color, short, leafy stalks, medium sized ears, small red cobs, deep grains. Adapted for planting in high altitudes, and will mature a crop farther north than any other known variety; will shell easier and can be husked earlier than any other sort."

Lb. 20c, postpaid. By Express or Freight, lb. 10c; 10 lbs. 50c; 25 lbs. \$1.00; 100 lbs. \$3.75.

Improved Leaming.

A very popular, tall growing variety. Its early, stalks are leafy, making excellent fodder. Kernels are long and deep golden yellow. Decidedly the best ensilage or silo corn. Lb. 20c, postpaid. By Express or Freight, lb. 10c; 10 lbs. 50c; 25 lbs. \$1.00; 100 lbs. \$3.75.

Pop Corn**Mammoth White Rice.**

Everybody knows this old variety. Our strain is an improvement, with larger ears, and the ears more abundantly produced. Six ears on a stalk is not a rare performance for this prolific and profitable pop corn. The grains are sharply pointed, and the ear is a handsome one. Most excellent for popping. Lb. 20c, postpaid. By Express or Freight, lb. 10c; 10 lbs. 75c.

Every market gardener and every private gardener in the land knows this grand old sweet corn. It is in high esteem for main crop or late use, being in especial favor with truckers and canners. The ears are of extra large size, are tender and toothsome, with deep grain, and remaining a long time in edible condition. Stowell's Evergreen is one of the most productive, profitable and most popular corns on the market, and will long be included among leading standard sorts.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25.

Cucumber

Culture.—In this latitude it is useless to plant in open ground until nearly the first of May. Make hills two feet in diameter and about six feet apart, and enrich them with well-rotted manure. Plant a dozen or more seeds, covering half an inch deep. When all danger from insects is over, pull all but three or four of the strongest plants. One ounce for fifty hills; two pounds per acre when planted in hills.

Pick all the fruit before it begins to ripen, as the vines will cease setting fruit as soon as any seed begins to mature. In gathering for pickles, cut stems, instead of pulling the fruit off, and be careful not to mar the fruit in any way, for if the skin be broken the pickles will not keep so well.

Early Short Green, or Early Frame.

An excellent sort both for table use and for pickling. Plants vigorous and productive. Fruit straight, handsome, small at each end, bright green, lighter at the blossom end, with crisp, tender flesh, and makes excellent pickles.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 85c, postpaid.

Boston Pickling or Green Prolific.

This is one of the most popular pickling cucumbers. It is of the very best form and quality, and has yielded at the rate of over 200,000 pickles per acre. The fruit is uniform in shape and appearance, and its enormous productive ability makes the variety a favorite one with pickle growers and commercial gardeners.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 85c, postpaid.



Cumberland Pickling.

The vines are hardy, of strong, vigorous growth, and fruit very freely. The young cucumbers are thickly set with small spines, and possess the distinctly roughened surface so much desired for small pickles. The large fruits average nine to ten inches in length by two and a half inches in diameter, with full rounded ends, and are of good quality for slicing.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Improved Early White Spine.

One of the best sorts for table use. The vines are vigorous, fruiting early and abundantly. The fruits are uniformly straight, light, bright green in color, with a few white spines. The flesh is crisp, tender and of excellent quality.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 85c, postpaid.

Klondike.

A medium early, white spined cucumber of handsome, very dark green color and of excellent quality for slicing. The vines are very hardy and productive. The fruits when mature are about eight inches long, and are uniform in size and shape. Color dark green, slightly striped at the ends. The dark green color is retained much longer and is affected less by the hot sun than any other sort with which we are familiar. Its uniform size and shape and splendid color have made this variety very popular as a shipping sort.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.

Improved Long Green.

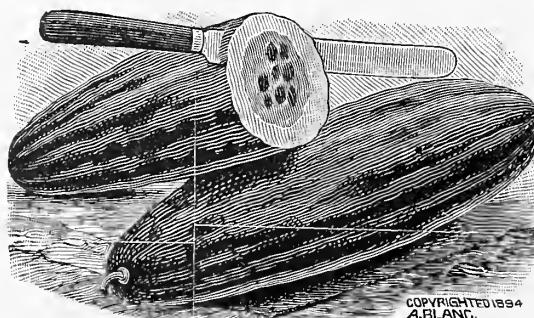
This fine cucumber grows from 12 to 16 inches or more in length and is of superior quality. The young fruit is very largely used for pickling, and it is a standard sort for that purpose. Full sized cucumbers are in high favor for making the so-called sweet pickles. Vines are strong growers, and the fruit is always produced in great abundance, making it one of the most productive varieties in cultivation.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.

Davis Perfect.

This popular new variety is well worthy of praise. The long, even fruits are of fine form, with an intensely dark rich green skin. With very few seeds the solid white flesh is of superb quality for slicing. So handsome and regular are the fruits that they bring an extra price on market—often being taken for "hot-house grown." The vines are of strong growth and quite prolific.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.



DAVIS PERFECT.

COPYRIGHTED 1894
A. BLANC.

Gherkin for Pickling.

A very small, oval, prickly variety, quite distinct from all others. It is grown exclusively for pickles; is the smallest of all varieties, and should always be picked when young and tender. The seed is slow to germinate, requiring usually from two to three weeks.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 40c; lb. \$1.25, postpaid.

Egg Plant

Those who have no hot-beds can sow a few seeds in boxes in the house where a temperature of 75 degrees can be maintained. Plant early in May two and a half feet apart. One ounce will produce about 1,500 plants.

Black Beauty.

A distinct new Egg Plant of most remarkable merit. The fruit is quite as large as Improved N. Y. Purple, and from ten days to two weeks earlier than that variety. It is very attractive in appearance, and of excellent flavor.

Pkt. 10c; $\frac{1}{2}$ oz. 25c; oz. 40c; $\frac{1}{4}$ lb. \$1.25; lb. \$4.00, postpaid.

Improved New York Purple, Spineless.

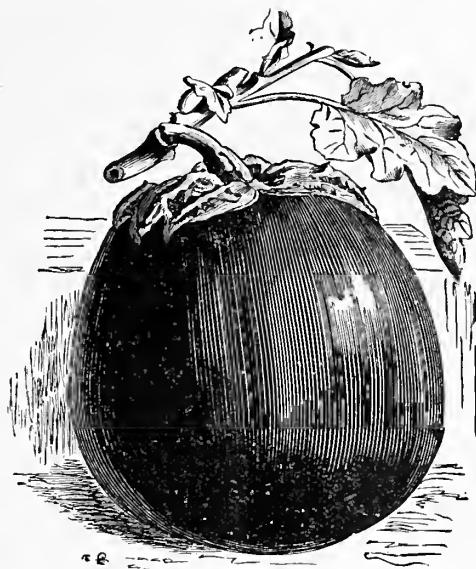
The standard for home use and market. Fruit very large, productive, and of the highest quality.

Pkt. 10c; $\frac{1}{2}$ oz. 25c; oz. 40c; $\frac{1}{4}$ lb. \$1.25; lb. \$4.00, postpaid.

Early Long Purple.

Eight or nine inches long. One of the earliest and very productive.

Pkt. 5c; oz. 20c; lb. \$2.00, postpaid.



BLACK BEAUTY.

Endive

Endive is an excellent autumn and winter salad. Sow seed late in the spring or even as late as July, in shallow drills, fifteen inches apart, and when plants are strong, thin out to about a foot apart. To blanch, gather up the outer leaves over the center of the plant, and tie them together at their tips. Sow one ounce to 100 feet of drill.

Green Curled.

This is the hardiest variety, and very desirable for the home and market garden. The deep green leaves are beautifully cut and curled, easily blanched, and become very crisp, tender and fine flavored.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Kale or Borecole

Borecole, Kale and German Greens are general terms applied to those classes of cabbages that do not form heads, but are used in their open growth. Some of the varieties are the most tender and delicate of any of the cabbage tribe. They are hardy and are not injured by the frost.

Sow early in May and transplant. Culture same as for Cabbage. One ounce will sow 300 feet of drill.

Dwarf Green Curled Scotch.

Dwarf, beautifully curled, and bright green; hardy, and may be cut from the ground all the early part of winter.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Herbs

A very small space in the garden will give all the herbs needed in the family. The culture is very simple, and the best way is to make a little seedbed in the early spring and set the plants out in a bed as soon as large enough. As a general rule it is best to cut the herbs when in flower, tie them up in small bunches, and hang in the shade to dry. We give a list of the herbs generally cultivated and prized.

	Pkt.	Pkt.
Anise, lb. \$1.00; oz. 10c	5	Lavender True, oz. 25c
Caraway, lb. \$1.00; oz. 10c	5	Marjoram, Sweet, oz. 20c
Dill, oz. 10c	5	Rue, oz. 20c
Sage, lb. \$2.00; oz. 20c	5	Sorrel, French, oz. 15c
		Thyme, oz. 30c

Kohl Rabi

The edible part is the turnip-shaped bulb formed above ground. It is tender and excellent when used before fully grown, combining somewhat the flavors of cabbage and turnip. Seed should be sown in light, rich soil as early in spring as possible in rows one and one-half feet apart and when well established thin to six inches apart in the row. Plantings at intervals of ten days will give a succession until hot weather, when they fail to grow well. Plantings may be made the latter part of July for fall use.

Early White Vienna.

Very early; small, handsome, white bulb. This is the very best early variety for table use.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 50c; lb. \$1.75, postpaid.

Leek

The Leek is a mild onion-like plant. It is prized for soups, and is thought to be superior to the onion for this purpose. Sow early in April, in drills, covering the seed half an inch deep. When the plants are about the size of a quill, transplant to a deep rich soil, in rows one foot apart, and five inches apart in the row, setting the roots deep, so that the neck may be covered and blanched.

Large American Flag.

A variety similar to, but larger than the London Flag; very popular with market gardeners.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 50c; lb. \$1.50, postpaid.



KOHL RABI.

Lettuce

Culture.—Lettuce ought to be grown rapidly, and therefore it should be sown in a rich, thoroughly prepared soil. Sow in the open ground as early as possible, barely covering the seed. If the hotbed is used, let it be started quite early. Give but little heat and plenty of water and air on fine days. Let plants in the bed be about four inches apart. As they increase in size thin them out, or they will become weak. One-half ounce will sow 100 feet of drill.

Varieties marked A are particularly adapted for culture under glass and for early spring use. Those marked B are sometimes grown under glass, but are especially desirable for outdoor summer culture.

Cabbage or Heading Varieties. Early Tennis Ball.

A. (Seed black.) One of the best heading lettuces, especially desirable for early planting outdoors and also suitable for forcing. Plants large, having thick, bright green leaves, forming very solid heads, the inner leaves blanching to a rich, creamy white, and are crisp, tender and buttery. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

May King.

A. (Seed white) This is a handsome, extremely early, compact, cabbage or heading variety for the home garden and market, forming very firm heads of medium size and excellent quality. The color is light yellowish green, tinged with reddish brown when mature. The inner leaves blanch rich golden yellow, very tender and buttery. The plant is very compact for so large a head. The variety is exceptionally early outdoors, attaining a size suitable for use before other sorts and is also very satisfactory for forcing. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 35c; lb. \$1.25, postpaid.

Big Boston.

A. (Seed white.) A very popular variety with those gardeners who want a large heading sort, and also for outdoor winter culture. The outer leaves are a rich green, crisp and tender, and the center of the head a beautiful butter-yellow and white, very fine grained, and packed as close as a cabbage. Big Boston is more extensively used for market than any other variety. Plants are sure headers, and stand a long time before seeding.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Hanson.

B. (Seed white.) One of the most desirable later summer lettuces. The plant is compact and forms a large, cabbage-like head which remains in condition longer than most heading sorts. Outer leaves bright yellowish-green, broad, somewhat crumpled and frilled at edge and with distinctive midrib. Inner leaves white, very crisp and sweet.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Los Angeles, or New York.

B. (Seed white.) A large, crisp, tight-heading lettuce which is a great favorite in the markets of Los Angeles and San Francisco. This is a lettuce much praised around New York whence its name was taken. The quality is the finest, and is an excellent lettuce for the garden. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 40c; lb. \$1.50, postpaid.

Salt Lake Market or Iceberg.

Very Large, Extremely Crisp, Hard Heading and Extra Long Standing.



SALT LAKE MARKET.

leaves are blanched to a pure white and are always crisp and brittle.

While essentially a mid-summer variety, this new lettuce is equally desirable for early spring planting or for fall use. In cool weather the heads grow to a larger size than they do during the summer, and remain in a fine condition for table use much longer than will the smaller heads of the earlier sorts. Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 40c; lb. \$1.25, postpaid.

B. (Seed white.)
The best introduced
in years.

In good soil, with ordinary cultivation, the plants grow twelve inches across, and make large, closely folded heads fully eight inches across. The outer leaves are a bright green lightly tinged with brown on the top of the head and grow closely about the head. The large heads are slightly flattened at the top and closely folded, so that the interior

Lettuce—Curled or Loose Leaved Varieties

Grand Rapids.

A. (Seed black.) As a lettuce for greenhouse forcing, this variety undoubtedly stands at the head of the list, being of quick growth, little liable to rot, and standing for some days after being fit to cut. The plant is upright and forms a loose head or cluster of large, light yellowish-green leaves, slightly crimped and blistered and rather thin. It will stand shipping long distances better than most sorts.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.



Prize Head.

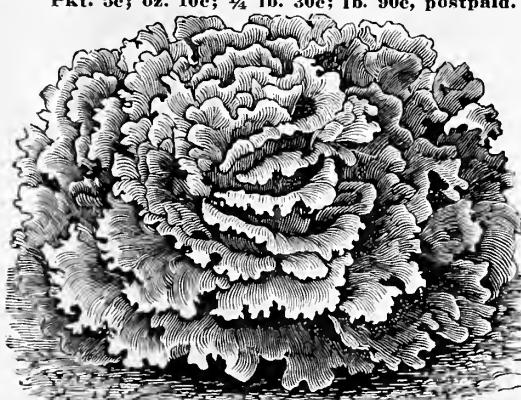
B. (Seed white.) A large, clustering, non-heading lettuce, most excellent for the home garden and undoubtedly the most easily grown variety in cultivation. It is too tender, however, to stand shipping or handling on the market. Leaves finely curled and crumpled, bright green tinged with brownish red, very crisp, tender and sweet.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.

Simpson's Early Curled.

B. (Seed white.) A very extensively used early loose leaved, or clustering variety. Leaves light green, slightly frilled and much blistered, crisp, sweet and tender. This sort is especially adapted for sowing thickly and cutting when the plants are young.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.



DENVER MARKET.

Black Seeded Simpson.

A. One of the best for sowing outdoors where an exceedingly tender leaf is desired and for those markets which demand a very large, loose clustering sort, of a light yellowish green color. Leaves ruffled and blistered and even the large outer ones are very tender. Uniformly attractive and remains of excellent quality a very long time.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.

Denver Market.

B. (Seed white.) An early variety of great merit. Forms large, solid heads of a light green color, and is slow to run to seed. The leaves are beautifully curled and crimped, and are tender and fine flavored. Its peculiar Savoy-like markings distinguish it from all other varieties.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.

Cos Lettuce.

(Romaine.) Cos Lettuce is distinct in having long, narrow, spoon-shaped leaves, folding into loose, sugar-loaf shaped heads which blanch better by having the outer leaves drawn about them and tied. Sow seed early in spring in rich, well prepared soil, in rows eighteen inches apart, covering one-half inch deep. When plants have two or three leaves thin to three or four inches apart. As the plants begin to crowd thin and use as required. If large heads are desired, plants should be thinned ten to twelve inches apart.

Early White Self-Folding.

(Seed white.) Leaves yellowish white, crisp, tender and of good quality; a self-blanching lettuce of superior flavor. Sold also as Romaine or Trianon.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Martynia Proboscidea.

A strong growing, hardy, annual plant with numerous seed pods which when young and tender are highly prized for pickling. Sow in rich, warm soil when danger of frost is past, in drills three feet apart and thin to two feet apart in the row.

Pkt. 10c; oz. 30c; $\frac{1}{4}$ lb. \$1.00; lb. \$3.00, postpaid.

The Gardeners' Friend "PURITY SEEDS."

Muskmelon or Cantaloupe

Plant the seed in hills six feet apart each way, dropping ten to twelve seeds in a hill. After the plants begin to crowd and the striped beetles are pretty well gone thin to four of the most vigorous plants in a hill. Give frequent but shallow cultivation, until the plants make runners so long that this is impracticable. Rich earth for the young plants is far better than manure, but if the latter must be used, see that it is well rotted and thoroughly mixed with the soil.

If the plants grow very rank, more and finer fruits will be secured by allowing the main branch to continue growing, but pinch off the end of each side branch after it has one fruit set. The quality of melons of all varieties is largely dependent upon conditions of growth and ripening. Unhealthy vines or unfavorable weather produces fruit of comparatively poor flavor. The plants are liable to attack from the striped beetles which are so numerous in some cases as to destroy them. The beetles may be kept off by frequent dusting with air-slaked lime, soot or sifted ashes diluted with fine road earth. Care should be taken not to use too much of any of the above materials or the vines will be injured. Should even the diluted material prove injurious to the vine, use road earth only, as frequent dusting with this alone will often prove effective especially if a wind is blowing.



ROCKY FORD OR NETTED GEM.

Anne Arundel.

This is an improvement on the well-known Acme or Baltimore Market, growing to double the size, with thicker green flesh. It is ready for picking immediately after the extra early sorts, is a heavier yielder and bears shipment well. A specially valuable quality is the hardiness of the vine and its freedom from blight. Pkt. 5c; oz. 10c; ¼ lb. 25c; lb. 75c, postpaid.

Baltimore, or Acme.

The fruits are medium sized, oval or long oval, slightly pointed at stem end, slightly ribbed, and are covered when ripe with coarse netting. The flesh is thick, green, well flavored and sweet. Pkt. 5c; oz. 10c; ¼ lb. 25c; lb. 75c, postpaid.

Extra Early Hackensack.

This is a very popular sort, producing large, handsome, and extra early melons of best quality. Fruit nearly round, deeply ribbed, and very coarsely netted. The flesh is green, of most delicious flavor. Pkt. 5c; oz. 10c; ¼ lb. 25c; lb. 80c, postpaid.

Osage, or Miller's Cream.

A remarkably fine variety, and a very profitable sort for market gardeners. It is of medium size, oval in form, dark green in color, handsomely netted, and slightly ribbed. The flesh is extremely and uniformly thick, of firm texture, rich salmon in color, highly flavored and delicious to the rind. Cavity very small. Good keeper and shipper.

Pkt. 5c; oz. 10c; ¼ lb. 30c; lb. 85c, postpaid.

Yellow Meated Japan.

All gardeners who have never tried this magnificent melon should purchase at least a package. The vines are hardy, permitting earlier planting, very prolific, and produce very large fruits, nearly as early as the smaller varieties. The melons are nearly round, deeply ribbed and covered with patches of netting. The skin is yellowish white when ripe.

Pkt. 5c; oz. 10c; ¼ lb. 30c; lb. \$1.00, postpaid.

Defender, or Burrell's Gem.

Many like a fine grained, smooth salmon-red fleshed muskmelon. Such is the Defender, the best of this sort; medium sized, oval; deeply netted and of an entirely distinct and delicious flavor. Pkt. 5c; oz. 10c; ¼ lb. 30c; lb. 90c, postpaid.

Winter Muskmelon or Casaba

Golden Beauty, the best of the Casabas. Bright yellow, about globular, with wrinkled skin slightly pointed at the stem end. The fruits are about six to eight inches in diameter. The flesh is pure white and very thick. Pkt. 5c; oz. 25c; ¼ lb. 75c; lb. \$2.50, postpaid.

Rocky Ford, or Netted Gem.

The melon is oval in shape, slightly ribbed and covered with a coarse netting. The flesh is thick, green in color, inclining toward yellow at the center, and has a most appetizing flavor and aroma, and is very sweet and juicy. Flesh is both tender and firm; tender enough for the table and firm enough to stand shipment. The rind is elastic, but not hard. It is unquestionably one of the finest early melons and best for market gardeners and shippers as well as for the home garden. Best and purest strain of seed, grown especially for us at Rocky Ford, Colorado.

Pkt. 5c; oz. 10c; ¼ lb. 25c; lb. 80c, postpaid.

Gold Lined Rocky Ford.

A new melon from Rocky Ford, Colorado; of a fine uniform shape and without ribs; slightly oval; meat thick, green, and light-gold toward center. We recommend this as an extra fine melon in flavor and in every way. Selected stock. Pkt. 10c; oz. 25c; ¼ lb. 75c; lb. \$2.50, postpaid.

Watermelon

Plant in hills eight or ten feet part. The same culture as recommended for Muskmelons will insure success. One ounce of seed will plant thirty hills, and four pounds an acre, with hills eight to ten feet apart. Allow three or four plants to remain in each hill.



PHINNEY'S EARLY.

Phinney's Early.

An unusually hardy, sure cropper. Vines vigorous and productive, fruiting quite early. Fruit medium size, oblong, marbled in stripes of two shades of green; rind thin; flesh pink, tender and crisp. Seed nearly white.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 65c, postpaid.

Early Fordhook.

This is the earliest large-fruited melon in cultivation. The fruits are of good size, rather short and blocky in form, with large diameter. Skin dark green occasionally with stripes of light green. Flesh bright red, crisp, sweet and of splendid quality. Rind quite thin, but skin tough, making an excellent shipping variety.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 65c, postpaid.

Gray Monarch, or Long Light Icing.

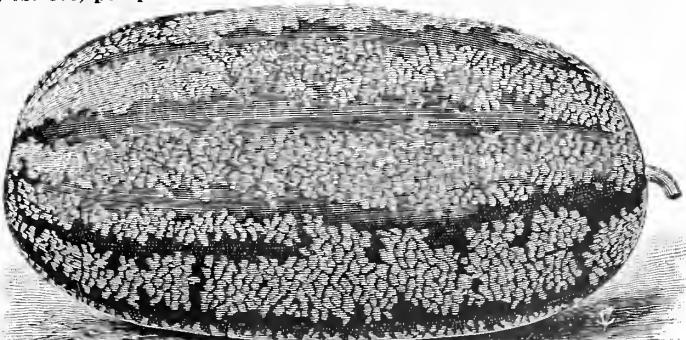
Our stock of this sort is much better than that usually offered and superior to many strains offered as Gray Monarch, etc. Fruits uniformly long and large, a little irregular in shape, light green, slightly veined with a little darker shade. Flesh deep, rich red, and of splendid quality. Seed white.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 60c, postpaid.

McIver's Wonderful Sugar.

This is of Southern origin, and is one of the very best melons in cultivation. It excels in both beauty and lusciousness, being exceedingly sweet and juicy. The melons attain great weight and size; oblong in shape, the rind showing broad stripes of light and dark green. The flesh is a rosy pink, perfectly solid, crisp and of delicious flavor.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 80c, postpaid.



McIVER'S WONDERFUL SUGAR.

Tom Watson.

A large, long melon similar in shape, color and splendid quality to Kleckley Sweets, but averaging larger in size and with a tougher rind, making it especially adapted for shipping. Vines vigorous and productive. Flesh rich red, sweet and tender. Seed white, more or less marked with brown. A comparatively new watermelon which is becoming very popular.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 35c; lb. \$1.25, postpaid.

Gypsy, or Georgia Rattlesnake.

One of the largest, oldest and most popular sorts, especially in the South. Fruit very long, of light green color, distinctly striped and blotched with a darker shade. Flesh bright scarlet, very sweet and tender. Vines large and vigorous. Seed nearly white.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 75c, postpaid.

Cuban Queen.

An excellent shipping variety of medium to large size and globular to oval shape. Rind quite thin, flesh bright red and firm. Skin striped with light and dark green.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 65c, postpaid.

WATERMELON—Continued.

Kleckley Sweets, or Monte Cristo.



KLECKLEY SWEETS.

which does not crack open when ripe, as is the case in many large melons. The rich, bright scarlet flesh is crisp, sugary and melting to the highest degree, being entirely free from any stringiness. The rich coloring of the flesh, together with its luscious sweetness, combine to make it the finest table melon now in cultivation. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 35c; lb. \$1.25, postpaid.

Dixie.

A decidedly popular melon. A cross between Kolb's Gem and the old reliable Mountain Sweet. It surpasses Kolb's Gem as a long distance shipping melon, while it fully equals the Mountain Sweet in its excellent flavor, and is ten to twelve days earlier than either. In shape about one-third longer than thick; color of skin dark green and beautifully striped; rind thin, but remarkably hard; flesh bright scarlet, sweet and juicy.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 75c, postpaid.

Citron for Preserves.

This variety grows uniformly round and smooth. It has handsomely striped and marbled skin of light green. Used only for preserves and pickles, and not for eating in the raw state. Very prolific.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 75c, postpaid.

Mushrooms

Mushrooms can be grown in any dark room or cellar, where the temperature can be maintained at 50 to 60 degrees. From old pastures procure the soil, and store it away. To one bushel of this soil add two bushels of fresh horse manure. Of this well-mixed compound prepare a bed, say three feet wide. Put down a thin layer and pound it down hard, and go on until you have a bed eight inches thick. It will soon become pretty hot, but let the heat recede until it is only 85 or 90 degrees. Then make holes, say a foot apart, and put in a piece of the spawn about as large as a walnut in each hole. Cover the holes and press the soil solid and smooth. Let the bed remain in this condition about twelve days; then cover it with two inches of fresh loam, and over this place four or five inches of hay or straw, and the work is done. If the temperature is right, in six or eight weeks you may expect mushrooms. The bed will continue bearing from twenty to thirty days. After the first crop is gathered, spread over the bed an inch of fresh soil, moisten with warm water, covering with hay as before. Ten pounds will spawn about ten square feet. Spawn, lb. 30c, postpaid.

Mustard

Mustard is not only used as a condiment, but the green leaves are used as a salad, or cut and boiled like spinach. The culture should be the same as that of cress.

Giant Southern Curled.

The leaves are light green, mild and tender when young. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.

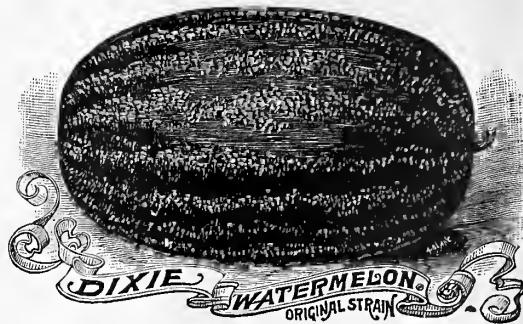
Okra or Gumbo

A large, vigorous, tender plant, cultivated in the South for its young seedpods, which are very nutritious, and are used in soups, stews, etc., and especially for making gumbo soup. Should be more generally grown in the North wherever it is warm enough for Sweet Corn. About the last week in May sow seed thinly, in drills one inch deep and three feet apart. When well up, thin the plants out to one foot apart in the row. Gather the pods when quite young (about an inch and a half long), before woody fibre is formed. One ounce of seed will sow fifty feet of drill.

White Velvet (White Creole.)

Pods round, smooth, much larger than other sorts; produced in great profusion. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 70c, postpaid.

The finest of all watermelons for home use or near-by market. The only drawback to the variety is that the fruits are too tender to stand shipment, the rind being so brittle that it is apt to split open in cutting the fruits for the table. The vines are strong and vigorous and the fruits grow uniformly to quite large size; oblong in form, eighteen to twenty inches long and ten to twelve inches in diameter, rather tapering at the ends. The skin is a rich dark green, while the flesh is bright scarlet, ripening close to the skin, the rind being only about half an inch in thickness. The seeds are white and rather long in shape; being in two rows lying close to the rind, they leave a very large open heart



Onions

Onions must have a clean and very rich soil, as it is useless to attempt to grow them on poor ground. A liberal use of manure is more essential to these than any other crop. Sow in drills not less than a foot apart nor more than half an inch deep, keeping the soil mellow and clear of weeds. One ounce will sow 100 feet of drill, or five pounds per acre.



EXTRA EARLY BARLETTA.

Extra Early Barletta.

(The Earliest Onion in Cultivation.)

The bulbs are of a pure paper-white color, very mild and delicate in flavor, from one inch to one and a half inches in diameter and three-fourths of an inch in thickness. On account of its small size, seeds may be sown quite thickly and makes an excellent variety for pickling. Bulbs should be dug and dried in the shade as soon as the tops die down, or they will start into fresh growth and take on a greenish hue. The onion is a good keeper.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 50c; lb. \$1.75, postpaid.

Queen.

A very early, very white skinned variety of especial value for pickling. When allowed to reach full size the bulbs are quite flat, but as grown for pickles are nearly round. The large sized bulbs attain a size of about two inches in diameter.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 50c; lb. \$1.75, postpaid.

White Portugal, or American Silverskin.

A medium sized onion of mild flavor and with beautiful, clear white skin, a favorite with many for use when young as a salad or bunching onion and for pickles; it is also a good keeper and fine for fall and early winter use. An excellent sort for gardeners who do not care to plant more than one variety. Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 50c; lb. \$1.75, postpaid.

Silver King, or Mammoth White Garganus.

This is mammoth in size, the largest onion in cultivation. The bulbs are very attractive in form, fine-shaped, flattened but thick, with a silvery white skin. The flesh is snow-white, fine-grained, exceedingly mild, and of pleasant flavor. It matures quite early.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 50c; lb. \$1.75, postpaid.

Red Wethersfield.

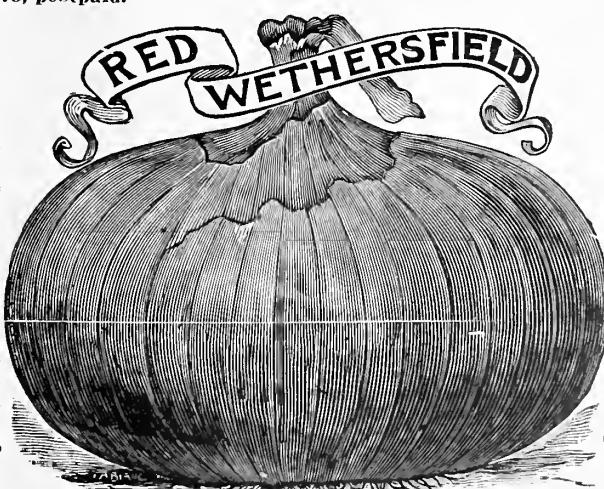
The standard red, and, owing to its productiveness, the most profitable for the market gardener. Form somewhat flattened, skin a deep purplish red, flesh purplish white. The best variety for poor or dry soils.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 45c; lb. \$1.50,
postpaid.

White Bermuda.

The Bermudas are the earliest Onions in the market, and are grown extensively in the South. Outer skin straw color, flesh pure white.

Pkt. 5c; oz. 30c; $\frac{1}{4}$ lb. 90c; lb. \$3.25,
postpaid.

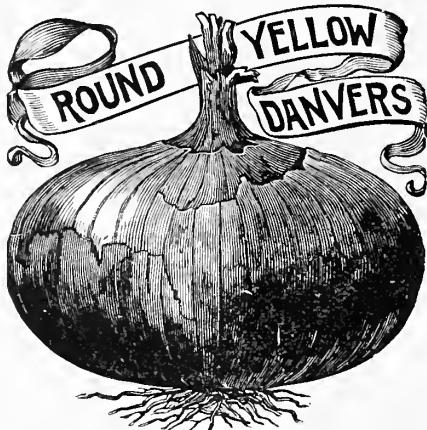


ONIONS—Continued.

Australian Brown.

Distinct from all other Onions; uniform in size and shape; wonderfully hard and solid, and will keep almost indefinitely. Ripens extremely early. It is of medium size, round, with a skin of a deep amber-brown; flesh mild and agreeable.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 40c; lb. \$1.25, postpaid.



Round Yellow Danvers.

A fine productive variety of medium size; skin copper-yellow; flesh white, comparatively mild and well flavored.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 40c; lb. \$1.25, postpaid.

Southport White Globe.

Handsome, large-sized, globular in form. Skin and flesh a pure white. To succeed in producing good pure white onions, the crop should be pulled just as the stalks begin to fall down, and then allow them to dry off in the open air, keeping them free from rain or dew, which would cause discoloration of the bulbs.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 60c; lb. \$2.00, postpaid.

Mammoth Prizetaker, or Yellow Spanish.

A very handsome late or main crop onion of the largest size and nearly globular in form, usually with shoulder and base slightly sloping. Skin is yellowish-brown or light yellow with slight tinge of brown; flesh creamy-white, very mild, tender and of excellent flavor. Keeps well if thoroughly ripened; very desirable for shipping. It is one of the best of the large European sorts that has become thoroughly acclimated in America and is exceptionally productive under proper conditions. If started very early in hotbed it will produce a mammoth onion the first season. Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 45c; lb. \$1.50, postpaid.

Yellow Globe Danvers.

This improved variety is pronounced by onion growers—who now grow it in preference to all other onions—the very best strain in cultivation. It is the earliest Yellow Globe variety, large in size, uniformly perfect in shape, and the largest cropper, producing from seed 1,000 bushels per acre with good cultivation. It is also the most reliable for bottoming and one of the best keepers of all American onions.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 40c; lb. \$1.35, postpaid.

ONION SETS.

Onion sets should be planted as early as the ground is in condition to work in rows 12 to 15 inches apart, with sets two inches apart in the rows. Green Onions for bunching come in very early, while the crop of large bulbs matures very much earlier than if planted from seed.

YELLOW BOTTOM SETS. Lb. 25c, postpaid.
By Express or Freight, lb. 15c; 10 lbs. \$1.25.

WHITE BOTTOM SETS. Lb. 30c, postpaid.
By Express or Freight, lb. 20c; 10 lbs. \$1.50.

If interested in larger lots write for special prices.

"PURITY SEEDS" PRODUCE BEST CROPS.



Parsley

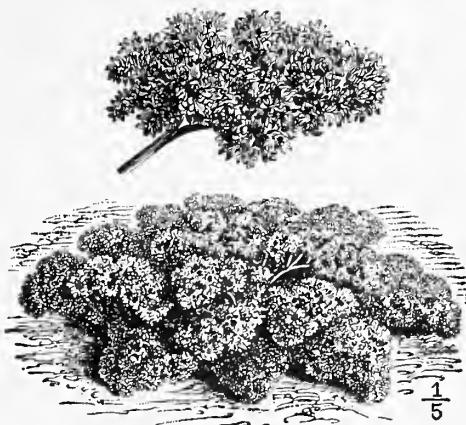
Champion Moss Curled.

Very useful for flavoring soups and stews and for garnishing. The green leaves are used for flavoring, or they may be dried crisp, rubbed to a powder and kept in bottles until needed.

Culture.—It requires rich, mellow soil. The seed is even slower than parsnip in germinating, and should be sown as early as possible in the spring, in drills one foot apart, and when the plants are well up, thin to one foot in the row. When the plants are about three inches high, cut off all the leaves, the plant will start a new growth of leaves which will be brighter and better curled, and if these turn dull or brown they can be cut in the same way; every cutting will result in improvement. The moss curled variety makes beautiful border plants.

A compact growing, finely cut and much curled variety, of a bright green color. Owing to its fine color and density of foliage, it is much sought.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 75c, postpaid.



PARSLEY.



Parsnip

The value of the Parsnip as a culinary vegetable is well known, but it is not generally appreciated at its full value for stock feeding. On favorable soil it yields an enormous crop of roots, which are more nutritious than carrots or turnips. Roots are very rich in saccharine food, adding to the richness of the milk when freshly dug and fed to cows, as well as greatly increasing the flow of milk.

Culture.—They do best on a deep, rich, sandy soil, but will make good roots on any soil which is deep, mellow and moderately rich. Fresh manure is apt to make the roots coarse and ill-shaped. As the seed is sometimes slow to germinate it should be sown as early as possible, in drills two feet to two and one-half feet apart; cover one-half inch deep and press the soil firmly over the seed. Give frequent cultivation, and thin the plants to five or six to the foot.

Improved Guernsey.

(Improved Half Long. Thick Shoulder.)

A greatly improved and wonderfully fine strain of Guernsey Parsnip, of which our customers are unanimous in praising the fine quality. The roots do not grow so long as the Hollow Crown, but are of greater diameter and more easily gathered. It is a very heavy cropper. The roots are very smooth, the flesh fine grained, tender and sugary, and considered the best for general cultivation. Parsnips are improved by remaining exposed to the frost.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 65c, postpaid.

When ordering Seeds by the pound, to go by Express or Freight, purchaser to pay transportation charges, 10 cents per pound may be deducted from prices quoted in this catalogue.

Peas

Sow Peas in drills about four inches deep. The drills must not be nearer than two feet, except for the lowest sorts. Those growing three feet high or more should not be nearer than three or four feet, and should have brush for their support. Avoid fresh manure and very rich soil, as they cause the vines to grow too rank. One pint will sow forty feet of drill; two bushels for an acre, in drills three feet apart. Our customers often write us inquiring the names of the three best Garden Peas, Early, Medium and Late. While all those in our list are good in their class, we name three which in our opinion are equal if not superior to other sorts; First Early, Gradus, plant as early as weather conditions will permit. Medium, Everbearing; Late, Improved Stratagem; plant the Medium and Late varieties about one week later than the Early.

The crop should be gathered as fast as it is fit for use. If even a few pods begin to ripen, not only will new pods cease to form, but those partly advanced will stop growing.

American Wonder



AMERICAN WONDER.

A variety nearly as early as the Alaska, with stout, branching vines, about nine inches high, and covered with well filled pods, containing seven or eight large, exceedingly sweet, tender and well flavored peas. Dry peas, medium sized, much wrinkled; pale green.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25; 100 lbs. \$9.00.

Premium, or Little Gem.

A very desirable, early dwarf, green wrinkled variety growing about fifteen inches high. When green it is very large, sweet and of delicious flavor.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25; 100 lbs. \$9.00.

Earliest of All, or Alaska.

By careful selection and growing there has been developed a stock of this smooth, blue pea, which in evenness of growth of vine and early maturity of pods is unequaled by any other extra early pea. Vines two to two and one-half feet high, unbranched, bearing four to seven long pods, which are filled with medium sized, bright green peas of excellent flavor. Ripe peas small bluish green. Matures all the crop at once and is an invaluable variety for market gardeners and canners. **Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25; 100 lbs. \$9.00.**

Gradus (Prosperity.)

As an extra early Pea, the Gradus being a sugar pea, is far superior to all smooth varieties, not only in its delicious quality, but also in the long pods. While the early smooth varieties contain four or five peas to the pod, the Gradus usually contains from eight to twelve.

Pkt. 10c; lb. 30c, postpaid. By Express or Freight, lb. 20c; 10 lbs. \$1.50; 100 lbs. \$12.00.

PEAS—Continued.

Dwarf Telephone, or Daisy.

A semi-dwarf, large podded main crop pea similar to Improved Stratagem but a little earlier maturing and lighter in color of vine and pod. Pkt. 10c; lb. 30c, postpaid. By Express or Freight, lb. 20c; 10 lbs. \$1.50; 100 lbs. \$11.00.

Improved Stratagem.

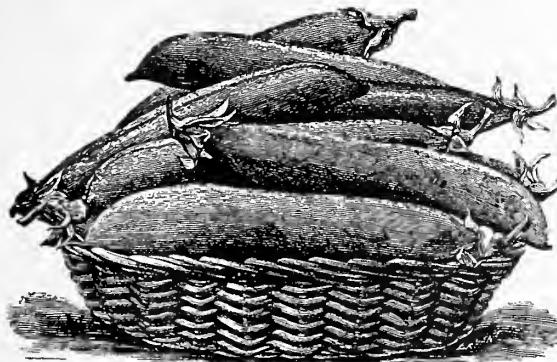
This is one of the best of the large-podded sorts; vigorous, productive, and of exceedingly fine quality; a favorite with market gardeners everywhere. Vines two to two and a half feet.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25; 100 lbs. \$9.00.

Nott's Excelsior.
The Best Early Dwarf Pea.

It combines to a wonderful degree the good qualities of the American Wonder and Premium Gem Peas without their deficiencies. The vines are larger and more vigorous than the American Wonder and earlier and more prolific than Premium Gem. The Peas in sweetness and quality are unsurpassed. A most desirable sort for the market gardener and unsurpassed for the home gardener.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25; 100 lbs. \$9.00.



IMPROVED STRATAGEM.

Alderman.

A valuable early main crop variety, yielding heavy crops of large, dark green pods, well filled with large Peas of the best quality. A splendid market gardener's variety.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 25c; 10 lbs. \$1.25; 100 lbs. \$9.00.

Thomas Laxton.

A fine, early, tall variety, similar to Gradus, but more hardy and not quite so early. It is also a little darker in color and has large blunt pods that fill well with peas of finest quality. Pkt. 10c; lb. 30c, postpaid. By Express or Freight, lb. 20c; 10 lbs. \$1.50; 100 lbs. \$12.00.

Yorkshire Hero.

Vines stout, of medium height, about two and one-half feet, bearing near the top a number of broad pods of medium size, about two and one-half to three inches long, filled with large peas that remain a long time in condition for use and which never become as hard as most sorts. The peas are of fine quality and will be preferred to any other by those who like a rich, marrow-like pea. Seed large, wrinkled and flattened.

Pkt. 10c; lb. 25c, postpaid. By Express or Freight, lb. 15c; 10 lbs. \$1.25; 100 lbs. \$9.00.

When Peas are ordered to go by Express or Freight, ten cents per pound may be deducted from prices quoted. 10 lb. lots or more sent by Express or Freight at purchaser's expense.

Pepper

The culture of pepper is precisely the same as for Egg Plant. Transplant when three inches high. One ounce of seed will yield about 1,500 plants.

Chinese Giant.

A magnificent variety and the largest and finest Pepper in cultivation. The plant is about two feet high, of strong, vigorous growth and very productive. The flesh is unusually thick and very mild, having none of the pungency of most of the older varieties. The immense size of the fruit and its brilliant scarlet color render it very attractive.

Pkt. 10c; $\frac{1}{2}$ oz. 25c; oz. 40c; $\frac{1}{4}$ lb. \$1.25; lb. \$4.00, postpaid.

Red Chili.

A late variety. Pods bright, rich red, about two inches long, one-third to one-half inch in diameter at the base, tapering to a sharp point and exceedingly pungent when ripe.

Pkt. 5c; oz. 25c; $\frac{1}{4}$ lb. 75c; lb. \$2.50, postpaid.

Long Red Cheyenne.

A well known medium early variety having a slender, twisted and pointed pod about four inches long. Color deep green when fruit is young, bright red when ripe. Extremely strong and pungent flesh.

Pkt. 5c; oz. 25c; $\frac{1}{4}$ lb. 75c; lb. \$2.50, postpaid.

Large Bell, or Bull Nose.

Very large, nearly four inches long and three inches in diameter; glossy red. Excellent for use in salads and pickles.

Pkt. 5c; oz. 25c; $\frac{1}{4}$ lb. 75c; lb. \$2.50, postpaid.

Ruby King.

A handsome and very productive variety. Fruits from four to six inches long by three and a half to four inches broad; remarkably mild and pleasant. When ripe they are a bright ruby red.

Pkt. 5c; oz. 25c; $\frac{1}{4}$ lb. 75c; lb. \$2.50, postpaid.

Pumpkin

Plant in hills eight feet apart each way, after danger of frost is over. Avoid planting near other vine crops, as they will hybridize and damage the crop. One ounce will plant about twenty-five hills; four pounds to the acre.

Sugar, or New England Pie.

This variety is small, but of most excellent quality for pies. Fruits deep orange, eight to ten inches in diameter, round or somewhat flattened and slightly ribbed. Flesh rich deep yellow, fine grained and very sweet.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 75c, postpaid.

Large Yellow, or Connecticut Field.

The pumpkin most extensively used for feeding stock; also used for making pies. Grows to a large size and varies in shape from nearly round or slightly flattened to quite long. Flesh deep, rich yellow, fine grained and highly flavored. Often planted with corn. Known also as Field Pumpkin.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 50c, postpaid.

Winter Luxury.

This is the finest pie Pumpkin yet introduced; we cannot recommend it too highly for this purpose. It is also a good keeper, wonderfully productive, while its finely netted skin and golden-russet color make it desirable for market use.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 75c, postpaid.

Large Sweet Cheese.

(Kentucky Field)

One of the best for table use, and very productive. Shape flat; skin mottled light green and yellow, changing to a rich crimson color; flesh yellow, thick, and tender.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.

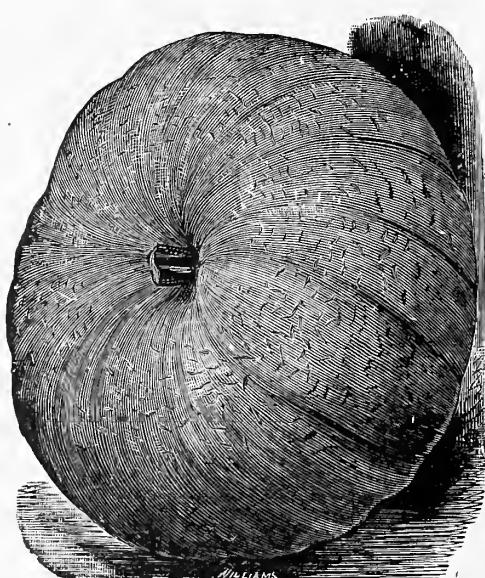
King of the Mammoths, or Jumbo.

The largest of all Pumpkins. Round in shape, flattened at both ends. It is a splendid keeper, and valuable for stock feeding; also desirable for exhibition purposes.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.



CHINESE GIANT.



KING OF THE MAMMOHTS.

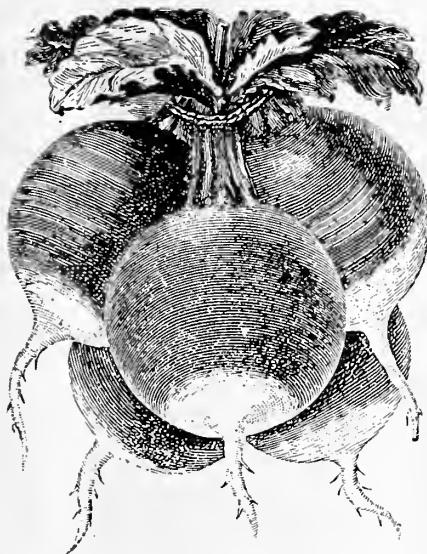
Radish

For early use seed should be sown in the hotbed, in drills, three or four inches apart and half an inch deep. For open ground sow as early as weather conditions permit. As soon as the first leaves appear, sprinkle with soot or ashes to save them from the turnip fly. The Winter Radish should be sown about the middle of the summer, and makes its best growth in autumn. One ounce will sow 100 feet of drill; ten pounds to the acre.

Non Plus Ultra, or Early Deep Scarlet Turnip, Forcing.

This is an excellent extra early forcing radish. The roots are small, nearly round and of bright scarlet color. Tops very small; flesh white, crisp and well flavored. One of the handsomest of the forcing varieties.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 70c, postpaid.



SALT LAKE'S FAVORITE.

Salt Lake's Favorite.

A new variety of an entirely distinct type. In shape it is globular; the top is very short, thus making it adaptable for forcing, although it is equally good for outside. The color is a rosy carmine, with a long white tip. Salt Lake's Favorite will keep longer in good condition than any other variety we have tried, and can be grown the year round. Successive sowings should be made during the summer.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 70c, postpaid.

French Breakfast, or Scarlet Olive-Shaped White Tip.

Fine for open ground or forcing. A medium sized radish, olive shaped, small top, of quick growth, very crisp and tender, of a beautiful scarlet color except near the tip, which is pure white. A splendid variety for the table on account of its excellent quality and its beautiful color.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.

Crimson Giant Forcing.

A fine solid radish, very early and crisp. The roots are nearly globe-shaped, of beautiful crimson-carmine color and most excellent quality. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 80c, postpaid.

Early Scarlet Turnip, White Tipped.

One of the handsomest of the turnip radishes and a great favorite in many large markets for early planting outdoors. Roots slightly flattened on the under side, color very deep scarlet with a white tip; flesh white and of the best quality. Cannot fail to give satisfaction.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.

Extra Early Scarlet Turnip.

A small, round, red, turnip-shaped radish with a small top and very quick growth. A very early variety, deserving general cultivation on account of its rich color and crisp, tender flesh. Desirable for forcing or early outdoor planting.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.

Scarlet Olive-Shaped.

A small, very early, olive-shaped radish of rich brilliant color.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.



FRENCH BREAKFAST.

RADISH—Continued.

Early Long Scarlet, Short Top.

This bright scarlet, small topped sort, is about six inches long, grows half out of the ground, is uniformly straight, smooth, brittle and crisp and is an excellent sort for private gardens or market use.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.

Icicle.

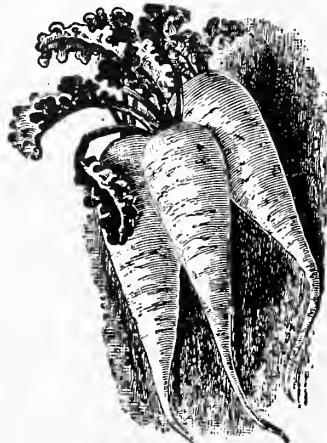
A very attractive, pure white radish, the earliest of the long, white summer sorts and of most excellent quality. The roots are somewhat shorter, with smaller tops than Long White Vienna and mature a little earlier. Roots when mature five to six inches long by about one-half to five-eighths of an inch in diameter. One of the most desirable varieties for outdoor summer planting. It is also adapted for forcing.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.

Long White Vienna, or Lady Finger.

An early maturing and attractive, long, white, summer radish of most excellent quality. Tops are of medium size. Roots pure white, slender, smooth and averaging when mature six to seven inches long by about five-eighths to seven-eighths of an inch in diameter at thickest part. Flesh very crisp and tender.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.



WHITE STRASBURG.

White Strasburg.

Even when comparatively small this variety is in good condition for use and continues crisp until matured when the roots are four to six inches long by one and one-half to two inches in diameter. This is considered one of the best large, white summer sorts. The roots remain in condition for use much longer than the early varieties.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.

Improved Chartier, or Shepherd.

This American variety is one of the very best long radishes for general planting outdoors. Tops of medium size. Roots are in good condition for the table when half an inch thick and continue hard and crisp until they reach a diameter of about one and one-fourth inches, thus affording good roots for a long time. The roots are rather long, averaging seven to eight inches when mature, scarlet rose in color, shading into white at the tip.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.

WINTER RADISHES.

Chinese Rose Winter (Scarlet Chinese.)

One of the very best for fall and winter use, and popular with market gardeners. Bright rose color; flesh white and firm, of superior quality.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 75c, postpaid.

White Chinese, or Celestial.

Is the finest of all extra large white radishes; the roots grow to immense size, averaging in rich soil, from twelve to fifteen inches in length and fully five inches in diameter; nearly the whole of the large roots grow above the surface, but are shaded from the sun by the abundant foliage, so that the skin remains a pure paper-white; and, notwithstanding the immense size, the flesh is always crisp and mild.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 75c, postpaid.



Long Black Spanish.

One of the latest and hardest long radishes, especially adapted for winter use. Roots rather long, thick, almost black, with white flesh of firm texture, decidedly pungent but well flavored. The roots when mature are usually seven to nine inches long by two to three inches in diameter at thickest part.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 75c, postpaid.



RHUBARB.

Rhubarb

Sow in drills eighteen inches apart and one inch deep. Thin out the plants to six inches apart. In the fall prepare the permanent bed by trenching two feet deep, mixing a liberal quantity of manure with the soil. Into this set the plants about five feet apart each way. The stalks should not be cut until the second year. One ounce should give about 500 plants.

Myatt's Victoria.

The most popular variety. Very productive.
Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 40c; lb. \$1.25, postpaid.

Salsify

or Vegetable Oyster.

Culture. Soil, seeding, culture and storing same as for parsnip. One oz. of seed will sow 60 ft. of row; 10 lbs. of seed required for an acre.

Mammoth Sandwich Island.

This variety is large and strong growing with long, smooth, white, tapering roots and is less liable to branch than the other sorts. Tops grassy. It is invaluable for market gardeners' use.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 40c; lb. \$1.25, postpaid.

Sorrel.

The improved varieties of Sorrel when well grown and cooked like spinach make a palatable dish. Sow in drills early in spring and thin the seedlings to six or eight inches apart in the row. One may commence cutting in about two months and the plants will continue in full bearing from three to four years.

Large Leaved French.

The best garden variety, having large, pale green leaves of fine quality.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 60c; lb. \$1.75, postpaid.

Spinach

Culture. For early spring use, sow seed in August in very fertile soil, rich in humus. Upon approach of cold weather, cover the plants with 3 inches of straw. In the spring when dry, remove the litter and the plants will be ready for use in a short time. Sow the seed 1 inch deep in rows a foot apart. For a succession, sow again early in the spring, and every two weeks thereafter. Keep surface soil cultivated lightly.

One oz. will sow 100 ft. of row; 12 to 15 lbs. seed required for an acre.

Savoy Leaved.

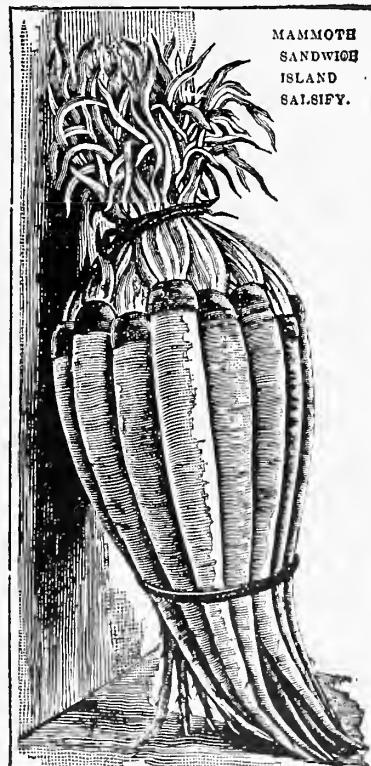
Also known as Bloomsdale. A very early variety and one of the best to plant in autumn for early spring use. The plant is of upright growth, with thick, glossy, dark green leaves of medium size, pointed but quite broad, and crumpled or blistered like those of Savoy cabbage. Seed round. It is hardy and grows rapidly to a suitable size for use, running to seed quickly in warm weather.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 15c; lb. 40c, postpaid.

Long Standing.

An improved round seeded strain of excellent merit, having all the good qualities of other sorts and continuing in condition for use much longer. The leaves are smooth and very dark, rich green. Very popular with market gardeners.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 15c; lb. 40c, postpaid.

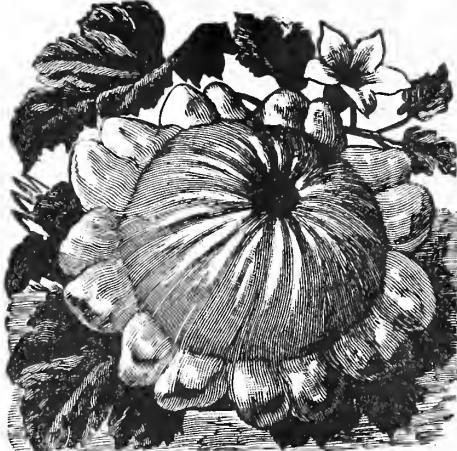


Squash

The Squash is one of the most nutritious and valuable of all our garden vegetables. Few farmers appreciate the value of winter squash as food for stock. We think an acre of squash, costing no more to cultivate, and much less to secure, will give as much available food for feeding stock as an acre of corn, and we strongly urge our readers to try a "patch" for this purpose.

Culture.—The plants are very tender and sensitive to cold and planting must be delayed until settled warm weather. The general principles of culture are the same as those given for cucumbers and melons, but Squash is less particular as to soil. The summer varieties should be planted four to six feet apart each way, and the winter sorts eight to ten. Three plants are sufficient for a hill.

In gathering winter sorts, care should be taken not to bruise or break the stem from the squash, as the slightest injury will increase the liability to decay.



MAMMOTH WHITE BUSH SCALLOP.

Mammoth White Bush Scallop.

(Silver Custard.)

The best of the scalloped Squashes. Hand-some and of fine quality.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 80c, postpaid.

Mammoth Bush Summer Crookneck.

The richest and best of the Summer Squashes. Early and productive. Color golden yellow; flavor sweet and rich. It is almost twice as large as the ordinary Summer Crookneck.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 80c, postpaid.

Long White Marrow.

Or Improved Vegetable Marrow.

One of the finest varieties for table purposes. Skin is very thin, color light yellow, salmon flesh. A good winter keeper.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.

Sibley, or Pike's Peak.

A very distinct and valuable variety. Shell pale green, very hard; flesh solid and thick, orange color; flavor rich and delicate.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.

Boston Marrow.

This is a very productive fall and winter variety of medium to large size, oval shape, and thin skin. The fruits when ripe are bright orange with a shading of light cream color. The flesh is of rich salmon yellow color, fine grained and of excellent flavor, but not as dry as the Hubbard. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 80c, postpaid.

Delicious.

This is a splendid variety, more like the Hubbard than any other, but surpasses it in some respects for home use, as it is not quite so large. The shell is not so hard, the meat is thicker and of extra fine quality. Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 40c; lb. \$1.25, postpaid.

Golden Hubbard.

This is a true Hubbard Squash except in color, which is a bright orange-red. The flesh is deep golden yellow. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.

Hubbard.

This is a superior variety and one of the best of winter squashes; flesh bright orange yellow, fine grained, very dry, sweet and rich flavored; keeps perfectly good throughout the winter; boils or bakes exceedingly dry and is esteemed by many to be as good baked as the sweet potato.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c, postpaid.

Mammoth Chili.

The largest of all Squash; grows to an enormous size. One of the most profitable sorts for stock-feeding. Keeps well throughout the winter. This variety is also extensively grown for fair exhibits.

Pkt. 5c; oz. 15c; $\frac{1}{4}$ lb. 40c; lb. \$1.25, postpaid.

Noxall, or Utah.

This is the "Jumbo" of the Squash family. It is an extra large-fruited sort quite distinct in form and appearance. Flesh firm and solid and of excellent quality. Decidedly the best field variety grown.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 20c; lb. 60c, postpaid.



HUBBARD.

Tomatoes

Very good plants can be grown in boxes in the house, but to obtain fruit very early, sow in a hotbed in February. In about five weeks plants should be transplanted to another hotbed, setting them about four or five inches apart. Here they should remain, having all the air possible, until after the middle of April, when they may be put out in the ground, four feet apart each way. If not too early or too cold, a coldframe will answer for the first transplanting. The soil for early tomatoes should not be too rich, and a warm, sheltered location selected, if possible. Pinching off the ends of the branches when the first fruit is set, will hasten the ripening very much. One ounce will produce 2000 plants; one-quarter pound (to transplant) for an acre.

Earliana.

The extreme earliness of its large, smooth fruits makes it a particularly profitable tomato for market gardeners. Vine small but vigorous and productive. Fruits deep scarlet, medium to large, nearly round and exceptionally smooth for so early a variety. The fruit is borne in clusters near the base of the plant and the bulk of the crop ripens very early.

Pkt. 5c; oz. 25c; ¼ lb. 75c; lb. \$2.50, postpaid.

Chalk's Early Jewel.

One of the very best early tomatoes yet introduced. Vine vigorous and very productive. Fruits deep scarlet-red, nearly round and somewhat flattened, smooth, of large size and most excellent quality. They ripen very early and the pickings continue through a long season. Unsurpassed for the home garden.

Pkt. 5c; oz. 25c; ¼ lb. 75c; lb. \$2.50, postpaid.

June Pink.

An extra early, purplish pink tomato, similar to the popular scarlet fruited Earliana in growth of vine, shape and size of fruits and time of maturing. This is a variety of exceptional value to market gardeners who want an early, purplish pink tomato, either for home market or to ship; also desirable for planting under glass.

Pkt. 5c; oz. 25c; ¼ lb. 75c; lb. \$2.50, postpaid.

Early Bonny Best.

A good forcing scarlet tomato. Uniform in size and smoothness. Greatly esteemed by market gardeners.

Pkt. 10c; oz. 30c; ¼ lb. 75c; lb. \$2.50, postpaid.

Beauty.

Vine large, vigorous and very productive. Fruits large, purplish pink, exceptionally smooth and uniform in size, very solid and of excellent quality. Ripens about midseason.

Pkt. 5c; oz. 20c; ¼ lb. 60c; lb. \$2.00, postpaid.

Dwarf Champion.

The Standard Variety for all People and Places.

Dwarf and compact in habit, the plant growing stiff and upright, with very thick and short-jointed stems, requiring no stakes. Often sold as Tree Tomato. Can be planted as close as three feet. Unsurpassed as a cropper. Color deep red, with a purplish tinge. Round and smooth.

Pkt. 5c; oz. 25c; ¼ lb. 75c; lb. \$2.50, postpaid.

Acme.

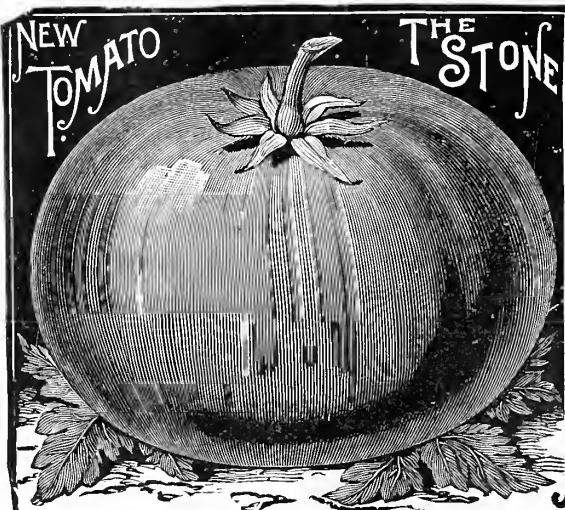
Vine large, hardy and productive, ripening its first fruit very early, although not an extra early variety. Fruits purplish pink, invariably round, smooth and of good size, free from cracks and stands shipment well. Flesh solid and of excellent flavor.

Pkt. 5c; oz. 20c; ¼ lb. 60c; lb. \$2.00, postpaid.

When You Want Fine Vegetables Plant "PURITY SEEDS."



TOMATOES—Continued.



Stone.

The Best Red Tomato for Garden or Field.

Ripens for main crop; very large, color bright scarlet; very smooth; ripening even to the stem without a crack; exceedingly solid and firm fleshed; an excellent shipper; quality the very best; not subject to rot; its appearance on market remarkably attractive; a heavy variety. It is the standard Tomato for market gardeners and truckers, and superior for canning.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 60c; lb. \$2.00, postpaid.

Ponderosa.

A purplish pink tomato of the largest size. Vine vigorous and very productive. Fruits very solid, with exceptionally few seeds, fairly smooth and considered of very good quality, especially by those who prefer a tomato quite free from acid. Ripens about midseason. Very desirable for slicing.

Pkt. 5c; oz. 40c; $\frac{1}{4}$ lb. \$1.25; lb. \$4.00, postpaid.

Matchless.

A main crop variety, very popular in the east. Fruits large, very smooth and symmetrical, ripening well to stem. Flesh rich, bright red in color and of fine quality, although possibly not quite as firm as Stone.

Pkt. 5c; oz. 30c; $\frac{1}{4}$ lb. \$1.00; lb. \$2.75, postpaid.

Dwarf Stone.

The vines are dwarf but vigorous and productive. Although maturing with the later sorts the fruits are of good color, being an attractive bright red, exceedingly smooth and very solid. It is a desirable sort for the home garden. We consider this the best of the large fruited dwarf tomatoes. Pkt. 5c; oz. 30c; $\frac{1}{4}$ lb. 90c; lb. \$3.25, postpaid.

Perfection.

A medium to large tomato of deep crimson-scarlet color and of the best quality. Vine large, vigorous and productive. Fruits nearly round, uniformly smooth and even in size. Ripens about midseason.

Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 60c; lb. \$2.00, postpaid.

Red Pear Shaped.

Used for preserves and to make "tomato figs." Fruit bright red, distinctly pear shaped, and with a peculiar flavor.

Pkt. 5c; oz. 25c; $\frac{1}{4}$ lb. 75c; lb. \$2.50, postpaid.

Yellow Pear.

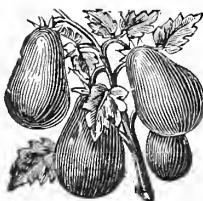
Fruit pear shaped, clear, deep, yellow color; flesh yellow and fine flavored. Much esteemed for preserves.

Pkt. 5c; oz. 25c; $\frac{1}{4}$ lb. 75c; lb. \$2.50, postpaid.

Red Cherry.

Fruit small, about five-eights of an inch in diameter; perfectly round and smooth. Fine for pickles and preserves.

Pkt. 5c; oz. 25c; $\frac{1}{4}$ lb. 75c; lb. \$2.50, postpaid.



RED PEAR.



RED CHERRY.

Turnips

Sow in drills from twelve to eighteen inches apart, and half an inch deep. In this climate we sow from the 25th of July until the middle of August. Swede or Ruta Baga Turnips should be sown the first of June, the rows being about eighteen inches apart, and the plants in the rows not less than ten inches. One ounce of seed will sow 200 feet of row; and two to three pounds are required for an acre in drills.

Extra Early Purple-Top Milan.

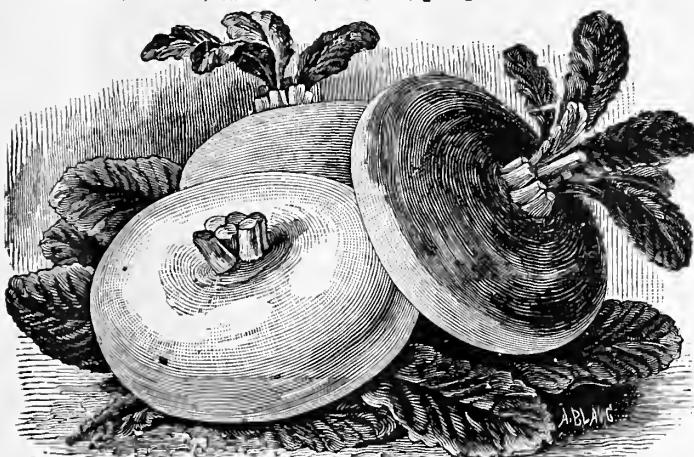
A white variety, purple-top and strap-leaf. This, with the White Milan, is the earliest of all Turnips; remains in good condition a long time.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.

Extra Early White Milan.

Similar to above except it is pure ivory white in color, and about one week earlier.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00, postpaid.



EARLY WHITE FLAT DUTCH AND EARLY PURPLE-TOP.

White Egg.

A quick-growing, egg-shaped, perfectly smooth, pure white variety, with small top and rough leaves. It grows half out of the ground. The flesh is very sweet, firm and mild, never having the rank, strong taste of some white varieties.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 70c, postpaid.

Purple-Top White Globe.

An improved variety of the purple-top flat Turnip; globular in shape, of fine appearance, a good keeper, of excellent quality, and equally desirable for table or stock.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 65c, postpaid.

Orange Jelly, or Robertson's Golden Ball.

It is of very fine texture and the best, sweetest and most delicious of the yellow-fleshed varieties. It is of medium size with small tap-root, a rapid grower, matures early and keeps well. A superior table variety.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 70c, postpaid.

Ruta Bagas or Swede Turnips

American Purple-Top, or Improved Long Island.

This is a strain of Purple-Top Yellow Ruta Baga of American origin, selected to a smaller top and much shorter neck than is usually found, while the roots grow to a large size and are of the finest quality. We consider this one of the most desirable kinds on our list.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 60c, postpaid.

Monarch, or Tankard.

This is a yellow-fleshed sort, having very large tankard shaped roots, with relatively small necks and tops. Color purplish-crimson above ground, yellow below; flesh very solid; fine grained and of the best flavor. This very popular variety is also sold as Hurst's Monarch, and Carter's Elephant.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 60c, postpaid.

Early Purple-Top Strap-Leaved.

Flat, medium size, purple above ground, white below. The most popular variety for early use, either for table or stock.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 65c, postpaid.

Early White Flat Dutch,

Strap-Leaved.

A most excellent garden variety. Root medium size, flat; color, white; very clear, sweet and tender. Desirable for table use, but is spongy and inferior when overgrown.

Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 70c, postpaid.

A Descriptive List of Choice Flower Seeds

The pleasure resulting from a large and varied collection of flowers will amply repay for time and labor spent.

To have a beautiful flower garden, one must take pleasure in working and caring for the plants when young. It has ceased to be a necessity to keep such large stocks of bedding and other tender plants under glass through the winter, thereby saving the expense of glass, fuel, labor, etc. We are enabled to send out the highest results of carefully selected seeds, in cheap paper packets from which the amateur will derive his plants by means so simple as to be within the reach of everyone.

Nothing is more beautiful than the old-time and natural flowers. Do not cast aside the single Petunias, Hollyhocks, Fox-gloves, Forget-Me-Nots, and the old-time Phlox and Peonies, for nothing is handsomer than the old-fashioned flowers. Were we to assist nature more rather than try to create monstrosities, our gardens would look by far more beautiful and natural.

The soil best adapted to most flowering plants, is a light, moderately rich loam, containing a sufficient amount of sand to make it friable. A great many varieties will live in almost any soil, but to give them a fair chance to develop, some care should be taken to make it suited to their needs. Many flowers are better if produced on plants of vigorous growth; hence a portion of the garden should be prepared by deep digging, thorough pulverization and liberal enriching with large quantities of well rotted manure. Since other varieties produce the largest and finest colored flowers when grown on rather light, poor soil, a portion of the garden should not be enriched.

Cultural directions are given on nearly all packets, and we urge purchasers to study them carefully. While some seeds need special treatment, the following general rules will apply to all: Make the surface as fine and smooth as possible; do not plant any seed when the ground is wet; cover each lot of seeds to a uniform depth, which should never be more than three or four times the diameter of the seed; press the soil firmly over the seeds; plant in rows so that the young plants can be easily seen and pull up all weeds as soon as they appear.

The term "Annual" is given to those plants which grow, flower, seed and die within the same year.

"Biennials" are those plants that do not generally flower until the second season, and after blooming die.

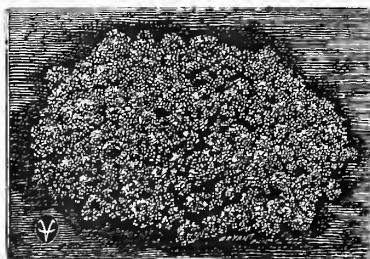
"Perennials" are those that do not generally flower until the second year, but continue to bloom for years and may be propagated by a division of the roots.

Acroclinium.

(Everlasting.) Very pretty, half-hardy annual, producing white and rose-colored daisy-like flowers in August and September. These are the "Immortelles," so desirable for wreaths and winter bouquets. Height one foot. **Mixed. Pkt. 5c.**

Ageratum.

The different varieties of Ageratum grow from six inches to two feet or more in height and are very profuse and constant bloomers. They bear clusters of round tassel-shaped blossoms, which are excellent for cut flowers and in borders. Hardy annual. **Mixed. Pkt. 5c.**



ALYSSUM.

Alyssum (Little Gem.)

(Benthami Compactum.) A beautiful white variety of Sweet Alyssum, especially adapted to edgings, borders and rock work. The plants grow about six inches high, and produce hundreds of flowers, which form a compact mass of bloom about fifteen to eighteen inches in diameter. Hardy annual. **Pkt. 5c; oz. 50c.**

Antirrhinum (Snapdragon.)

An old border plant with dark and glossy leaves and long spikes of curiously shaped, brilliant colored flowers, with finely marked throats. They have been much improved of late years by careful selection. They blossom the first season from seed sown in spring. Tender perennial; one and one-half to two feet high. **Finest mixed. Pkt. 5c.**

If You Want Fine Flowers Plant "PURITY SEEDS."

Asters

No flower, not even excepting the Pansy, with its marvelous range of color, or the Sweet Pea, with its wonderful display of bloom, can approach in many important respects the Aster. As a bedding plant it has no superior, and is the last to succumb to the icy touch of winter.

As a cut flower it rivals the Chrysanthemum in beauty and diversity of form and color, and remains firm and fresh for days. They are easily grown, very hardy, and offer themselves for use at a time when other garden favorites are gone.

Truffaut's Perfection Peony Flowered.

This magnificent race must be seen in order to get any adequate idea of the possibilities in aster culture. The plants form large compact bushes about eighteen inches high, which in the full flowering season are literally covered with large extremely double, perfectly shaped flowers. **Mixed, pkt. 10c.**

Semples or Giant Branching.

This is the most distinct and improved type of flowers in Asters as well as of the earliest period of bloom. Under good cultivation plants grow two feet high, branching freely, and each stem terminates in a fine large flower two to two and a half inches in diameter. The outer petals are broad, flat, and reflexed or curving outward, while the center of the flower is composed of many short tubular petals, slightly pointed. The whole flower has a distinctly feathered effect, greatly resembling that of the fine Japanese Crysanthemums.

Lavender—Light Lavender,	
blue, very free flower-	
ing.....Pkt. 10c; oz. \$1.25	
Rose—Delicate shade of	
pinkPkt. 10c; oz. \$1.25	
Purple.....Pkt. 10c; oz. \$1.25	
Crimson.....Pkt. 10c; oz. \$1.25	
Flesh Pink.....Pkt. 10c; oz. \$1.25	
White.....Pkt. 10c; oz. \$1.25	
Mixed.....Pkt. 10c; oz. \$1.00	

Daybreak Aster.

This superb aster is one of the rare gems that has come to stay; color a delicate sea-shell pink; flowers are round, very large and full, borne upright on long, stiff stems. **Pkt. 10c.**

Purity Aster.

A snow-white aster, similar to Daybreak, except in color. The plants are very neat, of medium height, and are literally covered with a mass of flowers like snow-balls. **Pkt. 10c.**

BACHELOR BUTTONS—See Centaurea.

Balsam.

Known as Lady Slipper and Touch-Me-Not. Balsams have been so much improved by cultivation that, with good seed and proper care, a single flower is the exception now rather than the rule. The colors range from white to dark purple, and are either self-colored or spotted and striped. Balsams are tender and should be started in boxes indoors or in the open ground when danger of frost is past. The plants prefer a rich, moist or even wet sandy loam, and must not suffer from moisture. Hardy annual; one to two feet high.

Double Camellia, Extra Fine Mixed.

As double as a Camellia, which it resembles; white blotched with various colors.
Pkt. 5c; oz. \$1.00.

BELLIS—See Daisy.

You Obtain Best Results When You Sow "PURITY SEEDS."



SEMPLES OR GIANT BRANCHING.

California Poppy (Eschscholtzia.)

A genus of the Poppy family, and fully as valuable as the common Poppy for garden ornamentation, and as easily grown. Nothing is handsomer or richer in color than a bed of these in full bloom. Hardy annuals; height one foot.

Mixed, pkt. 5c; oz. 20c.



CALLIOPSIS.

Calliopsis.

A very showy border plant, producing flowers of very brilliant yellow, orange, crimson, red and brown, beautifully contrasted. Hardy annual; two feet high. Tall varieties Mixed.

Pkt. 5c.

CALENDULA.—See Marigold.

Canary Bird Flower.

(*Tropaeolum canariense*.) A beautiful climber with small curiously shaped, canary colored blossoms. Will bloom freely from July until killed by frost. Tender annual; height about twenty feet.

Pkt. 5c.

Candytuft.

Rocket (Empress). White extra large trusses. A great improvement in the size and quality of the flowering trusses over the common white variety.

Pkt. 5c; oz. 25c; fine mixed, pkt. 5c; oz. 25c.

Canna.

The Canna will bloom from seed the first year if the seed is sown early. Seed should be soaked for twenty-four hours in warm water before sowing.

Crozy's New Hybrids.

These Cannas are the most gorgeous bedding plants we have. Most of them are dwarf in habit, early bloomers, and remarkable both for beauty and size of flower and foliage. If seeds be sown before April in hotbed or greenhouse, the plants will bloom in July, and continue until frost. These plants may be potted in the fall and kept blooming through the winter, or the roots may be taken up in late fall and kept like Dahlias and replanted the following spring. Mixed varieties.

Pkt. 10c.



CANNON, MARGUERITE.

Carnation, Marguerite.

This flower is, in some of its habits, a decided improvement over all known forms of its species. Seed of this variety will give good flowering plants in four or five months, while the old kinds require at least a year. The flowers are large, double, very fragrant and borne in great abundance. This is an early continuous bloomer, and gives a great variety of colors. Height about fifteen inches.

Marguerite, Giants of California.

Mixed, pkt. 10c.

Canterbury Bell.

(*Campanula Medium*.) Handsome, hardy biennial, of stately growth, rich color and profuse bloom. Succeeds best in light, rich soil, and should be transplanted two feet apart. Has large bell-shaped flowers which are strikingly effective. Double mixed, pkt. 10c.

Castor Bean.

(*Ricinus*) *Zanzibariensis*. A comparatively new species of wonderfully vigorous growth. The plants grow from ten to fifteen feet high. The leaves have a brilliant luster, measure about thirty inches across, and in different plants range from bright green with green stems to deep bronze with dark red stems. We know of no annual plants so desirable for concealing unsightly objects or of more imposing beauty when standing alone on the lawn. Of very quick growth in rich soil. Tender annual.

Mixed varieties, pkt. 5c; oz. 20c.

CELOSIA CRISTATA.—See Cockscomb.

Centaurea.

Centaureas are an exceedingly interesting genus of plants, embracing annuals, biennials and perennials which though botanically alike are very different in appearance. The following varieties are easily grown from seed.

Cyanus (Bachelor's Button, Corn Flower). This is the flower seen in such abundance in the fields of Europe. If seed is sown as soon as the ground is fit in the spring and the flowers picked so as to prevent the plant exhausting itself by seeding, it will furnish a profusion of bright blue, purple, white or pink flowers from July until late in the autumn. One to two feet high.

Mixed, pkt. 5c; oz. 25c.

Imperialis. An excellent sweet-scented variety. The flowers are finely lacinated and are about the size of a carnation. They have long stems and keep well after cutting. Colors range through white, rose, lilac, purple and yellow. Hardy annual; about eighteen inches high.

Best mixed, pkt. 10c; oz. \$1.00.

Cheiranthus Cheiri.—See Wall Flower.

Chrysanthemum.

Chrysanthemums have deservedly become very popular. They are showy and effective in the garden, and very desirable for cut flowers. Hardy annuals, one and one-half to two feet high, and are most desirable for the garden.

Coronarium, mixed, pkt. 5c.

Cosmos.

A very effective autumn flowering plant. Quite hardy and rapid growing, forming bush-like plants four to eight feet high and covered with large, single, dahlia-like flowers. Should be started in this latitude in March and transplanted to open ground about May 1st.

Hybrida, Giants of California. This variety produces a profusion of large flowers which, being gracefully poised on long stems are extremely useful for decorative purposes.

Mixed, pkt. 5c; oz. 50c.

Convolvulus Major.—See Morning Glory.

Cucurbita.—See Gourds.

Cockscomb.

(Celosia Cristata.) Highly ornamental plants, producing crested heads of flowers, somewhat resembling a cock's comb. They are of all shapes and colors, but of all colors the rose and crimson are the most brilliant and rich. Tender annual. The dwarf varieties are about one foot high.

Dwarf mixed, pkt. 5c.

Columbine.

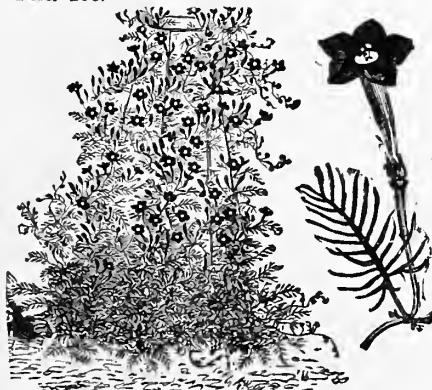
Thrives well with ordinary garden culture, but are quite at home under the spray of a fountain or by the water side. The plants are perfectly hardy and form large clumps from one to two feet in diameter, and produce a large number of flowers early in spring. Seeds may be sown in open ground. Plants can be increased by division of root. Perennial.

Mixed double, best and finest colors, pkt. 5c.

Coreopsis

Grandiflora. One of the best hardy perennials. Very free-flowering. The large, showy, golden yellow flowers are borne on long stems, and will last a week or more when cut, making them very desirable for that purpose. Will grow anywhere. Two to three feet.

Pkt. 10c.



CYPRESS VINE

Cypress Vine.

(Ipomoea Quamoclit.) A most beautiful climber, with delicate, dark green, feathery foliage, and an abundance of bright, star-shaped, rose, scarlet or white blossoms, which contrast most beautifully with the graceful foliage. Tender annual; about fifteen feet high.

Mixed pkt. 5c.

Dahlia.

Both the single and double strains of this magnificent race of plants may be had in the greatest variety and beauty from seed. If planted early and forced they can be made to flower the first season. Tender herbaceous perennials.

Fine double, mixed, pkt. 10c.

Daisy.

(*Bellis*.) The Daisy has been so far improved by selection and careful cultivation that good seed will give at least eighty per cent of double flowers. These are as large and double as any of the named sorts that are propagated by division of the roots and are sold at a high price. The plants bloom well in the house and are splendid for early spring and summer flowering when planted in a slightly shaded situation.

Extra Double Mixed, pkt. 10c; 1/2 oz. 65c.

Delphinium.—See Larkspur.

Dianthus.—See Pink.

Dianthus Babbatus.—See Sweet William.

Dianthus Caryophyllus.—See Carnation.

Eschscholtzia.—See California Poppy.



DAISY.

Four O'Clock.

(*Marvel of Peru*.) The plants are large and each needs three or four feet of space each way for its best development. The flowers are funnel-shaped, white, red and striped, and open about four o'clock in the afternoon, remain open all night, and generally perish before noon the next day. The French call it *Belle de Nuit*. "Beauty of the Night." Will grow in any common garden soil. Sow seed in open ground. Hardy annual; two feet high.

Mixed ptk. 5c; oz. 20c.

Forget-Me-Not.

(*Myosotis*.) The Forget-Me-Not is an old favorite, bearing clusters of star-shaped flowers. It thrives well in shade or open border. Hardy perennial.

Victoria. Plant of compact, bushy habit growing six to eight inches high; flowers large blue. **Pkt. 5c.**

Foxglove.

(*Digitalis*.) Plants grow to a height of three or four feet and produce dense spikes of brilliantly colored flowers. A valuable flower in every perennial garden; does not usually blossom until the second year. Hardy biennials or perennials.

Splendid mixed, ptk. 5c.

Gourds.

(*Cucurbita*.) A tribe of climbers with curiously shaped and colored fruit. Being of rapid growth, they are fine to cover old fences, trellises, stumps, etc. Tender annual; ten to twenty feet high.

Mixed, ptk. 5c; oz. 20c.

Gypsophila (Baby's Breath).

The flowers are small, star-like, and borne in feathered sprays which are highly esteemed for cut-flowers, as they lend a most graceful effect when combined in bouquets with Sweet Peas. Successive plantings of seed should be made a few weeks apart to furnish a continuous supply of flowers.

Pkt. 5c; oz. 40c.

Heliotrope.

Highly valued for the fragrance of their flowers and duration of bloom. Half hardy perennial, blooming the first year from seed; one foot high.

**Dark varieties mixed, very choice, ptk. 10c.
Helianthus.—See Sunflower.**

Hollyhock.

The Hollyhock, in its present state of perfection, is very unlike its parent of olden time; it now ranks with the Dahlia, Aster, Camellia, etc., being exceedingly rich and varied in color, and as double as a rose. For a background to a flower garden perhaps no plant is so useful. Hardy perennial; five feet high.

Mixed, Pkt. 10c.

Iberis.—See Candytuft.

Ipomoea, Imperial Japanese.—See Morning Glory.

Indian Shot.—See Canna.

Ipomoea, Quamoclit.—See Cypress Vine.

Larkspur.

(*Delphinium*.) The Larkspur is one of the handsomest and most useful of plants, and for large gardens is invaluable.

Double Dwarf Rocket. Hardy annual; ten inches high. **Mixed, ptk. 5c.**

Tall Stock Flowered, Consolida f. pi. Spikes of double flowers eighteen inches long. Hardy annual; two feet high. **Mixed, ptk. 5c.**



GORDS.

Lobelia.

A most elegant and useful genus of plants of easy culture and well adapted for bedding, edgings, pots or rockeries. They make a neat edging for beds of white flowers and are very effective in masses, being always completely covered with flowers.

Mixed, pkt. 5c.

Lathyrus Latifolius.—See Perennial Peas.

Lathyrus Odoratus.—See Sweet Peas.

Marigold.

Whenever a rich and continuous display of bloom is desired, the Marigold is almost indispensable. The African varieties are tall, growing usually two feet or more, while the French are more dwarf. All are desirable. Hardy annuals; in bloom till frost comes.

African, double mixed, pkt. 5c.

French, double Dwarf mixed, pkt. 5c.

Mathiola.—See Stocks.

Marvel of Peru.—See Four O'Clock.

Mignonette.

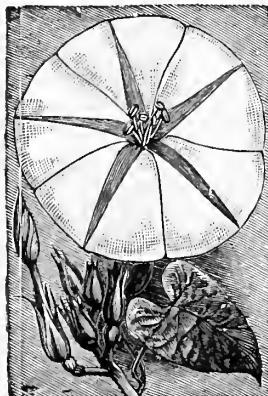
A well-known hardy annual producing dense, semi-globular spikes of exceedingly fragrant flowers. It is so fragrant that the whole atmosphere around is perfumed. If sown at intervals in spring and early summer, it will bloom till killed by frost. Seed sown in autumn will bloom early in spring. Hardy annual; one foot high.

Reseda Odorata Grandiflora. Large flowered sweet Mignonette.

Pkt. 5c; oz. 25c.



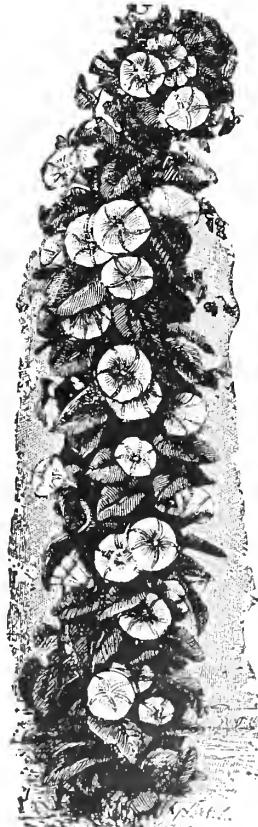
MIGNONETTE.



MOON FLOWER.

Moon Flower.

(*Ipomoea Grandiflora Alba*.) This is one of the most vigorous of all the summer climbers. Will grow thirty to forty feet in a single season, and will be covered with its large, white flowers every evening and cloudy day. The hard outer coat of the seed should be cut through with a sharp knife and the seed planted in a warm place. If the soil be kept moist germination will take place in ten days to two weeks. After the plants are up, tend carefully and plant out when danger from frost is past. Rich soil tends to make the plant run to vines and leaves, while poor earth will produce earlier and more abundant flowers. This variety is also known as *Ipomoea Notiflora*. Pkt. 10c.



Morning Glory.

(*Convolvulus Major*.) A handsome, showy climber, of easy culture, suitable for covering arbors, windows, trellises, old stumps, etc. It is so perfectly hardy as to grow in almost any soil. Hardy annual; ten feet high.

Mixed pkt. 5c; oz. 15c.

Giant Japanese Mixed. Flowers of largest size, some are brilliant red or rich blue; others are equally brilliant with broad margins of clear white; some are striped or dotted with blue or red on white or lemon yellow ground, others are clouded with blue and red. The foliage in some plants comes plain green, in others it is mottled with white and shades of yellow or yellowish green.

Pkt. 5c; oz. 25c.

Mourning Bride.

(*Scabiosa*, or *Sweet Scabious*.) An improved stock which bears a profusion of flowers. These are larger and fuller than the old type, and their variety and brilliancy of color make them very desirable for cut flowers. Hardy annual; about one foot high.

Double Dwarf, mixed, pkt. 5c.

"PURITY SEEDS" PRODUCE BEST FLOWERS.

Nasturtiums

These most popular, free-flowering tender annuals are of two distinct types—the Tall, or running varieties and the Tom Thumb, or dwarf varieties. Both are of easiest culture, growing and blooming in great profusion even in the poorest soils. The tall varieties are of strong, vigorous growth, throwing out running shoots which can be trained upon strings or wires, or can be readily made to climb the ordinary palings fences or wire netting. They are also extremely showy as trailing plants when set around borders of vases or ornamental boxes, on the lawn, and can be effectively planted at the top of a steep slope and allowed to run down the bank. They are equally beautiful simply trailing on level ground. The dwarf or Tom Thumb varieties, being of neat, compact growth, can be planted as borders to flower-beds or along garden walks. Seed should be planted thinly when trees are starting out in leaf. When well started, young plants should be transplanted or thinned out to stand six or more inches apart for tall running varieties, and ten or twelve inches for those of the dwarf. When planted in poor soil they flower profusely; if the soil is too rich they run to leaves.

Nasturtium, Tall.

(*Tropaeolum Lobbianum*.) The Lobbianum differs from the common running nasturtium, in being less rank growing, more floriferous and having richer, more varied colored flowers of many shades, from the richest scarlet to very deep maroon. Fine for covering arbors, trellises and rustic work. Half hardy annual; about ten feet high. **Mixed Tall (Lobbianum varieties),** pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

Nasturtium, Dwarf.

(*Tropaeolum Minor*.) A bed of dwarf nasturtiums in the yard is very brilliant and attractive, blooming all the season. Hardy annual; about one foot high. **Mixed Dwarf,** pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

Pansy

The Pansy gives an abundance of bloom until after severe frosts, endures hard winters with safety, and greets us in the early spring with a profusion of bright blossoms. Pansy seed may be sown in the hot-bed or open ground. If sown in the spring, get it in as early as possible, so as to secure flowers during the early rains. Seeds sown in a cool place in May or June, and well watered until up, will produce fall-flowering plants. To have good flowers, the plants must be vigorous and make a rapid growth, as they will in rich, moist loam. Young plants give the largest flowers. The old worn-out plants should be replaced. If the plants come into bloom in the heat of summer, the flowers will be small at first, but as the weather becomes cooler they will increase in size and beauty. They will flower better in midsummer if planted where somewhat shaded from the hot sun, and especially if furnished with a good supply of water; but in almost any situation will give fine flowers in the spring and autumn.

Imperial German Pansies.

The Imperial German Pansies are famous for their almost endless variety of charming shades of color, united with large size and perfect form of flowers. They embrace all the solid or self-colors, delicately shaded flowers, five-spotted or three-spotted; edged or bordered flowers of various colors, each with a distinct rim of white, yellow or blue; dark and light marbled varieties, flowers with clear, distinct eyes; striped flowers of striking beauty, and vividly colored fancy varieties, blotched, veined, marbled and margined.

Fine Mixed, ptk. 10c.

Improved Giant Trimardeau.

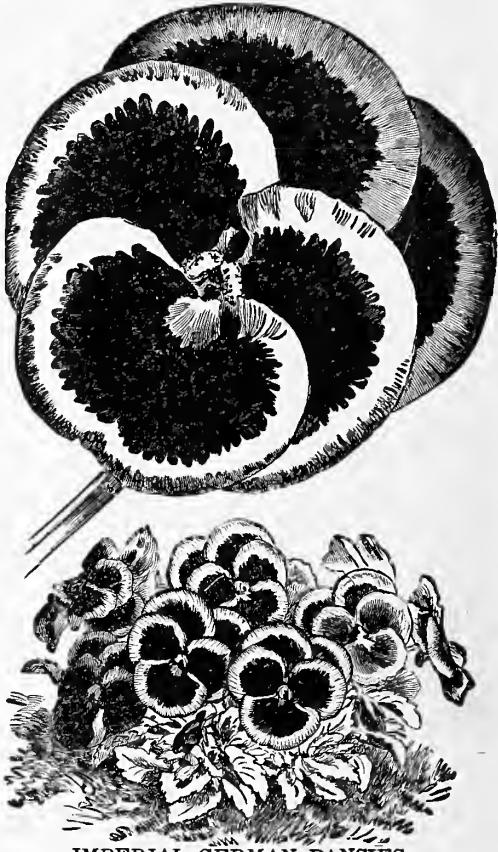
An entirely distinct and beautiful race with flowers of the richest and most varied shades of colors. Plants are vigorous, compact growth. Remarkable for the extra large size of the flowers, which, however, are not so circular in form as the Imperial German. The flowers, which possess unusual substance and consistency, are each marked with three large blotches or spots.

Fine Mixed, ptk. 10c.

Peas, Everlasting

(*Lathyrus Latifolius*.) A perennial climber, producing a succession of clusters of white, rose or purple blossoms. Suitable for trellises, arbors, etc. Hardy perennial; ten feet high.

Mixed, ptk. 5c.



IMPERIAL GERMAN PANSIES.

Petunia.

Petunias are unsurpassed for massing in beds. Their richness of color, duration of bloom and easy culture will always render them popular. They do well sown in open border in spring, or earlier in cold frame or hotbed, and transplanted eighteen inches apart. Tender perennial, but blooms profusely the first season. One and a half feet high. The fully double Petunias do not produce seed, so that to procure double flowering plants we must use seed of single flowers which have been carefully fertilized by pollen from double ones.

Fineest double mixed, pkt. 25c.

Fineest large flowering, single, mixed, pkt. 10c.

Phlox Drummondi.

Very hardy annuals, thriving in almost any situation, and unequalled in magnificent display of their many and brilliant flowers. Plants from seeds grown in open ground in fall or early spring will begin flowering about July 1st and remain literally covered with bloom until after severe frosts late in autumn. For masses of separate colors or for cutting for bouquets, they are unsurpassed. One foot high.

Fineest Mixed. Composed of the best of the large flowered varieties. **Pkt. 5c.**



PHLOX DRUMMONDI.

Pink.

(Dianthus.) The Dianthus family furnishes the florist with many of his most beautiful flowers, including the Carnation, Sweet William and Florists' Pink, Chinese and Japanese in all their varieties. Hardy and half-hardy biennials and perennials, but nearly all blooming the first year from seed.

DOUBLE CHINA. A biennial of dwarf habit; flowers the first year, but the bloom is stronger the second.

Mixed, pkt. 5c.



CARNATION.
IMPROVED DOUBLE.

Poppy.

THE SHIRLEY. Everyone knows the old common corn poppy, or red weed, with its bright scarlet flowers. The Shirley is a strain of this magnificent species, which sports to numberless shades of colors, from pure white to rose, pink, carmine and deepest crimson. If the flowers are cut when they first open, they may be kept many days. **Pkt. 5c; oz. 50c.**

TULIP FLOWERED. Produces large, splendid, bright scarlet flowers well above the foliage. The petals form a tulip-shaped cup, and after a time black spots appear at the base of each petal. Strikingly beautiful, reminding one of a bed of brilliant tulips; hardy annual; about one foot high. **Pkt. 5c; oz. 50c.**

IMPROVED DOUBLE PAEONY FLOWERED. In dazzling richness and variety of colors the flowers are very showy. Simply scatter the seed in the open ground, and a mass of beauty will result; hardy annual, two feet high. **Mixed, pkt. 5c; oz. 40c.**

Portulaca.

There are scarcely any flowers in cultivation that make such a dazzling display of color as a bed of Portulacas. They are in bloom from about the first of July till killed by frost in autumn. Tender annual; about six to eight inches high.

Fine mixed single, pkt. 5c; finest mixed, double, pkt. 10c.

SCABIOSA.—See Mourning Bride.

Stocks.

The stocks as now grown are indispensable where a fine display of flowers is wanted. To such perfection has selection brought them that good seed will give a large proportion of flowers as double and as large as the named sorts grown from cuttings.

Germn Large Flowering, mixed. Pkt. 10c.

Sunflower.

DOUBLE CHRYSANTHEMUM FLOWERED. The most attractive of the very double sunflowers. Plant tall, growing seven feet high and blooming profusely all summer. Flowers very large, often eight to ten inches across, very double, with long fringed petals and resemble chrysanthemums. The color is a splendid, rich, golden-yellow, free from any black center. **Pkt. 5c; oz. 20c.**

MAMMOTH RUSSIAN. The giant among sunflowers; grows about six feet high. The stocks are sometimes used for fuel. **Oz. 5c.**



Sweet Peas

A Few Rules for the Successful Cultivation of Sweet Peas.

Early in the spring make a trench about six inches deep, in rich, mellow soil, so arranged that no water can stand in it, and plant the seed in the bottom, taking care not to cover it more than two inches. When the plants are about five inches high fill up the trench, and furnish some support for the vines to run upon. The plants should not be raised for two successive seasons upon the same ground.

Sweet peas should not be planted on the same ground after culinary peas.

Excessive manuring with stable manure in the row immediately before sowing the seed is not desirable. Ground intended for Sweet Peas, if not left in good condition after taking the last crop, will be better for manuring the previous fall rather than at the spring seeding.

The use of artificial fertilizers, bone meal, nitrate of soda, etc., can be made in spring at the time of planting or soon after.

Thin sowing, by which is meant planting the seeds from four to six inches apart, is conducive to vigor and strength of the plants, which come later into bloom, but continue much longer than the plants from thick seeding.

Frequent stirring of the soil with hoe or cultivator in dry weather, thus producing a dust mulch, is preferable to artificial watering, unless irrigation facilities afford opportunities for a regular and abundant supply of water.

Do not allow any flowers to go to seed or the plants will stop blooming.

One quarter pound of seed will sow fifty feet.

Inoculate your seed before planting with Farmo-germ Culture, it will very materially increase the yield, and insure larger blooms. By mail postpaid 35c per bottle.

Mixtures of Sweet Peas.

One of the most satisfactory ways of growing Sweet Peas is in a mixed row. The mixtures we offer are not made up of inferior or cheap stocks, but are of the very best qualities and are well proportioned so as to give a pleasing variety of bloom.

FINEST MIXED. This mixture consists only of the best large flowering sorts, new and old, in just the right proportions of white, bright red, pink, mauve and other colors to make the most brilliant show possible in the garden. We have given a great deal of study to selecting the best sorts, in proper proportions, and offer this mixture as the finest produced. We know it cannot be excelled at any price. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 80c, postpaid.

CHOICE MIXED. A cheap mixture, but a very good one, containing all the distinct shades and colors of the older and also many of the comparatively new varieties, but not the most recent introductions. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 25c; lb. 70c, postpaid.

SWEET PEAS—Continued.

AMERICA. White, nearly covered with splashes, stripes and dots of exceedingly bright carmine. The most brilliant red striped sort. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c.

BLACK KNIGHT. Glossy deep maroon, one of the darkest; medium size, open form. Better than Othello. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

DOROTHY ECKFORD. Vine very robust and exceedingly floriferous. Flowers of extra large size, pure white, beautifully shell-shaped; usually three on a stem. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c.

DAINTY. White, edged with light pink; hooded form; very long stem. Similar to but lighter than Eliza Eckford. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

EMILY HENDERSON. A bold, well-formed, clear white flower. Wings broad and well expanded. An early and wonderfully free and persistent bloomer. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c.

EXTRA EARLY BLANCHE FERRY. Vigorous and hardy, though dwarf habit, and a wonderfully free and persistent bloomer. It will be found to be the first to furnish flowers, either in greenhouse or out of doors, and it will continue to furnish them in great abundance longer than most varieties. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

FLORA NORTON. The best clear blue sweet pea. Medium size, open form, usually three flowers on a stem. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

HON. MRS. E. KENYON. The best of the deeper primrose shades; a beautiful, large semi-hooded flower. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c.

KATHIERINE TRACY. The color is a soft but brilliant pink in wings and standard. Plants vigorous and give a profusion of flowers, which continue large and fine until the end of the season. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

KING EDWARD VII. A bright, crimson-red of largest size; open form, well expanded, round standard. One of the very best. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

LADY GRISSEL HAMILTON. A large flower, similar in color to Countess Radnor, but nearer blue. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

LORD NELSON. Deeper in color than Navy Blue and especially on the vine is a very attractive rich deep blue. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c.

LOVELY. Flowers very large, fine form. A delicate shell pink, tinged with yellow; often four flowers on a stem. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c.

MISS WILLMOTT. A fine, semi-hooded type; standard orange pink; wings, rose tinted with orange. Of very large size; long stems; plant very vigorous. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c.

MRS. GEORGE HIGGINSON, JR. A very clear, delicate shade of lilac blue, self-colored; medium size, semi-hooded form, usually three flowers on a stem. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

MRS. WALTER WRIGHT. A very large, hooded, rose-purple, self-changing to rich bluish purple. A splendid variety. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

OTHELLO. A very dark maroon, practically self-colored, with almost black veining. Large size, hooded form. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

PRIMA DONNA. The stems bear three or four very large, perfect flowers of a brilliant, yet soft shade of pink. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. 90c.

PRINCE OF WALES. Flowers very large and a peculiar brilliant red, distinct in shade from any other sweet pea. Very attractive. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

QUEEN ALEXANDRA. A magnificent bright scarlet-red, very large, semi-hooded. Unsurpassed in brilliancy of color. Pkt. 5c; oz. 10c; $\frac{1}{4}$ lb. 30c; lb. \$1.00.

Spencer Varieties.

ASTA OHN. Suffused lavender or tinted mauve; true Spencer form, large and wavy. One of the best. Pkt. 10c; oz. 25c; $\frac{1}{4}$ lb. 85c; lb. \$3.00.

COUNTESS SPENCER. Bright, clear pink; very large, open form; long stems. A very desirable variety. Pkt. 10c; oz. 25c; $\frac{1}{4}$ lb. 85c; lb. \$3.00.

DAINTY SPENCER. White, suffused and edged with pink; large and of Spencer form; very free blooming. Pkt. 10c; oz. 25c; $\frac{1}{4}$ lb. 85c; lb. \$3.00.

FLORA NORTON SPENCER. This variety is more truly an Unwin in size, but is nicely waved. Bright blue with tint of purple. Pkt. 10c; oz. 25c; $\frac{1}{4}$ lb. 85c; lb. \$3.00.

FLORENCE MORSE SPENCER. A very large, delicate blush with pink margin. Of the best type; excellent for cutting. Pkt. 10c; oz. 25c; $\frac{1}{4}$ lb. 85c; lb. \$3.00.

GLADYS UNWIN. Bright, clear pink, a little deeper at the edges. Countess Spencer form, but a little smaller, lighter color and flowers more freely. Pkt. 10c; oz. 25c; $\frac{1}{4}$ lb. 85c; lb. \$3.00.

HELEN LEWIS. A rich crimson orange, with wings of orange rose. Size very large, fine Spencer form. Pkt. 10c; oz. 25c; $\frac{1}{4}$ lb. 85c; lb. \$3.00.

KING EDWARD SPENCER. Brilliant crimson-scarlet; very large and of open form. The best of the bright red Spencers. Pkt. 10c; oz. 25c; $\frac{1}{4}$ lb. 85c; lb. \$3.00.

WHITE SPENCER. Standard and wings of pure white, beautifully waved and fluted. An especially attractive variety. Pkt. 10c; oz. 25c; $\frac{1}{4}$ lb. 85c; lb. \$3.00.

SPENCER'S MIXED. All the Spencer varieties included in making up this magnificent mixture. A splendid range of colors is thus assured in this comparatively new class of sweet peas of such remarkably large size and wonderfully attractive form. Pkt. 5c; oz. 20c; $\frac{1}{4}$ lb. 70c; lb. \$2.50.

Sweet William.

(*Dianthus Barbatus.*) For display in the garden the Sweet William is unsurpassed. The seed can be planted very early in the spring, in open ground, and will blossom the following summer; or it can be sown in August and will make fine blooming plants for spring. Hardy perennial, one and one-half feet high.

Finest mixed, single pkt. 5c.

Finest mixed, double, pkt. 5c.

Tagetes.—See Marigold.

Tropaeolum Canariense.—See Canary Bird Flower.

Tropaeolum Lobbianum.—See Nasturtium, Tall.

Tropaeolum Minor.—See Nasturtium, Dwarf.



SWEET WILLIAM.

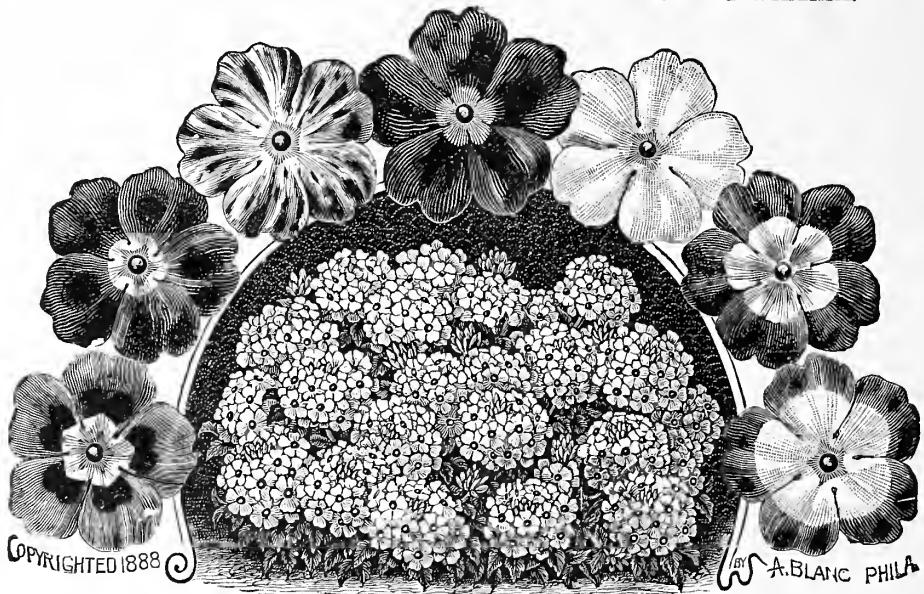
Violet.

The violets commonly grown by florists are propagated from cuttings. The flowers grown from seed are smaller and more delicately colored.

Sweet Scented, pkt. 10c.

Viola Tricolor.—See Pansy.

Verbena.



MAMMOTH VERBENAS.

MAMMOTH. No plant is more generally cultivated, or more deservedly so, than the Verbena, as no plant excels it for masses in beds or on the lawn. In the varieties may be found every color except yellow. If sown in open ground in May they will bloom in August, but if started in the house in pots in winter they will be in bloom sooner. Half hardy perennial trailer; one foot high. **Finest mixed;** embraces all colors.

Pkt. 10c; $\frac{1}{4}$ oz. 50c; oz. \$1.75.

Wall Flower.

(*Cheiranthus Cheiri.*) The large massive spikes of the Wall Flower are very conspicuous in beds and borders, and are very useful in making bouquets. Sow the seed early in hot-beds, and while the plants are small, prick them out in pots and sink the pots in the earth. On approach of cold weather remove the pots to the house, and the plants will bloom all winter. Tender perennial, one and one-half feet high. **Mixed double,** pkt 10c.

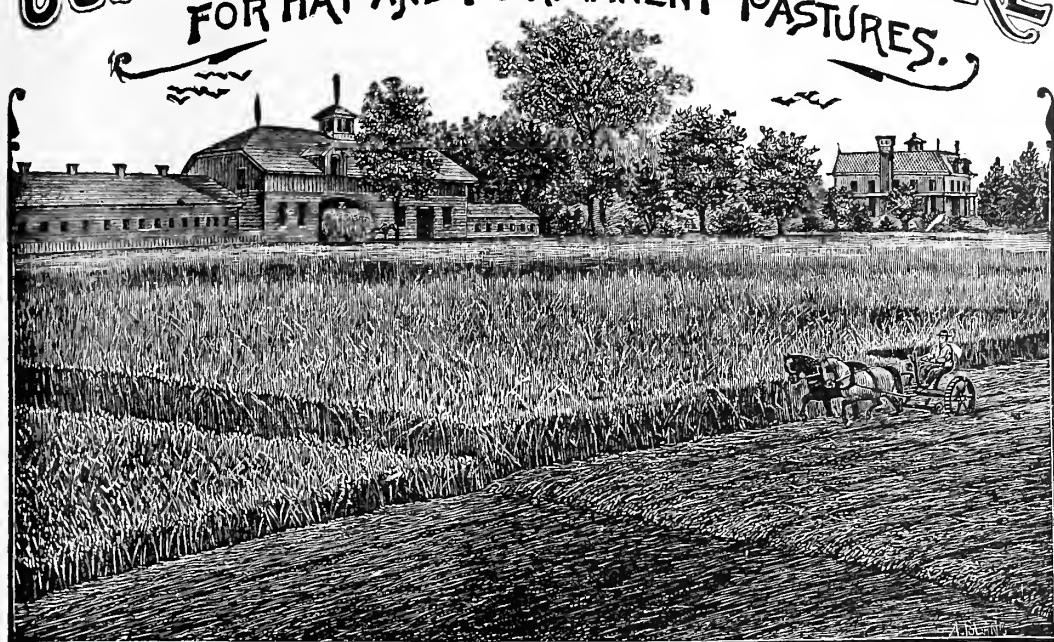
Wild Cucumber.

Ornamental climbing Cucumbers with curious fruit, remarkable for its luxuriance and rapidity of growth. Height six feet. Half hardy annual. *Eschinoecystis Lobata.* Pkt. 5c; oz. 20c.

Zinnia.

A very showy plant, with large, double, imbricated flowers, which, when fully expanded might easily be mistaken for dwarf Dahlias. Half hardy annual; about eighteen inches high. **Double finest mixed,** pkt. 5c.

OUR SPECIAL GRASS MIXTURE FOR HAY AND PERMANENT PASTURES.



Permanent Pastures and Meadows.

Since it has come to be an established fact that Grass is King and the Cow is Queen, it follows that more cows demand more and better grass and pastures, and how to obtain these is the great question with many farmers.

It is a well known rule of nature that a judiciously selected mixture of several varieties will produce a larger yield than can be obtained if only one variety is sown alone or by itself. When sowing a carefully selected mixture of Grasses and Clover, you run less risk than if you had carried all your eggs in one basket, so to speak. Some varieties may live and thrive on your particular piece of land better than others, and these will then have a chance to do their very best. A mixed pasture is earlier, gives a better yield, and holds out better than one sown down with but one kind of Grass. Many varieties sown together occupy the ground more closely, and a larger yield of hay, and of better quality, can always be obtained from a mixed meadow. In a great many parts of the country only one or two kinds of Grasses are known and mostly sown, and these are Timothy and Clover. While Timothy is a splendid Grass, and Clover the foundation of all successful farming, both are not permanent, and not well adapted for pasturing; are easily affected by drought or frost, thereby making it necessary to re-sow every year or two, a rather expensive method. In our carefully selected Clover-Grass Mixtures several varieties of the natural Grasses are sown together, and these will cover the ground very closely and make two spears of Grass grow where formerly but one grew; besides, these Clover-Grass Mixtures will stand various climatic and soil conditions better, will last longer or be permanent, and yield heavily or double the quantity of hay that is secured from ordinary fields sown with Timothy and Clover.

Clover-Grass Mixtures for Permanent Pastures, Meadows, or for Particular Purposes.

We selected them with the greatest care and use only such varieties as are best adapted for different kinds of soil and various purposes. Some varieties are of early and others of late growth, and this is a very important consideration when permanent pastures are wanted, and when wanted for mowing, the varieties must be selected so as to ripen nearly at the same time and be of good tall growth, while the low or dwarf growing varieties are better adapted for pasturing.

The prices of our Clover-Grass Mixtures we have always made as low as possible in accordance with the market price of the seeds, using the best quality of seeds only. Owing to the unusual high prices of some seeds at the present time, we are obliged to make the prices for our Clover-Grass Mixtures a little higher. It does not cost any more to sow our carefully selected Clover-Grass Mixtures than to sow Clover or Timothy alone, and when permanent results are considered, the Clover-Grass Mixtures are the cheapest by several times.

A.—Clover-Grass Mixtures for Permanent Pastures.

No. 1—For high and dry ground, light soils.

Red Top		Sow Per Acre.
Bromus Inermis.....	25 lbs. @ 24c.	\$ 6.00
Meadow Fescue.....		
English Rye Grass.....		
Tall Meadow Oat.....	50 lbs.....	11.00
Lucerne	100 lbs.....	21.50
White Clover.....		

No. 2—For moist ground, heavy or clay soils.

Blue Grass.....		Sow Per Acre.
Meadow Fescue.....		
Orchard Grass.....		
English Rye Grass.....		
Italian Rye Grass.....	20 lbs. @ 24c.	\$ 4.80
Timothy		
Red Top.....	50 lbs.....	11.00
Red Clover.....	100 lbs.....	21.00
Alsyke Clover.....		
White Clover.....		

B.—Clover-Grass Mixtures for Particular Purposes.

No. 3—We have selected this Clover-Grass Mixture with a view to suit the conditions in the Western and extreme Northwestern States, and for similar conditions elsewhere, and in sections of the country where Timothy or Clover are uncertain and do not succeed well when sown alone, but we include these as we have found that where they are uncertain when sown alone, they are more apt to succeed when sown with other varieties and should they fail, the other grasses take their place, and so an entire failure is avoided. This Clover-Grass Mixture is adapted to sow on land that will produce a crop of wheat, oats, etc., and is selected with a view to produce a crop of hay and pasture afterwards, or can be pastured entirely.

Bromus Inermis.....		Sow Per Acre.
Meadow Fescue.....		
Tall Meadow Oat.....		
Orchard Grass.....		
Timothy	20 lbs. @ 24c.	\$ 4.80
Blue Grass.....	50 lbs.....	11.00
Red Top.....	100 lbs.....	21.00
Alsyke Clover.....		
White Clover.....		
Red Clover.....		

No. 4—Crimson Clover-Grass Mixture or Special Renovating Clover-Grass Mixture, or Quick Return Mixture.—We selected and made this up for rapid growth with a view to use for either alternate husbandry or as a catch crop. When sown in early spring, March or April, it will give a full crop of hay in July and pasture for the rest of the year. It can also be sown in fields where the Clover or Grass has mostly been winter-killed, or otherwise injured, and where bare spots are in the spring, when it will be ready to cut with the other grass or clover, and a full crop from such field with bare spots can thereby be secured.

Crimson Clover		Sow Per Acre.
Italian Rye Grass....	15 lbs. @ 20c.	\$ 3.00
English Rye Grass....		
Tall Meadow Oat....		
Timothy.....	50 lbs.....	9.00
Red Clover.....	100 lbs.....	17.50

C.—Clover-Grass Mixtures for Particular Purposes.

No. 5—Dairy Farmers' or Orchard Grass-Clover Mixture. We have selected only the earliest, hardest, best and quickest growing varieties for this Clover-Grass Mixture. Dairy farmers want to cut a crop of hay very early and have pasture for the rest of the season, or make two crops of hay in a season; and this especially selected Clover-Grass Mixture is admirably adapted for this purpose. It is suited for good or medium soils, which will produce a good crop of corn or wheat, and can be sown anywhere in any part of the country.

Orchard Grass.....		Sow Per Acre.
Tall Meadow Oat.....		
English Rye Grass....	20 lbs. @ 22½c.	\$ 4.50
Italian Rye Grass....		
Meadow Fescue.....		
Red Clover.....	50 lbs.....	10.50
Alsyke Clover.....	100 lbs.....	20.00
Timothy		

When used for sowing in fields where there is some Grass or Clover already, the quantity to be sown per acre must be according to the stand of Grass or Clover. Usually five to ten pounds per acre is sufficient.

No. 6—This is our Special Alfalfa, or Lucerne Clover-Grass Mixture, and consists mainly of Alfalfa, Bromus Inermis and such varieties of grass as will stand drought and flourish on poor soils and give larger yields in the driest summers, after once being established. The quantity required per acre is 15 pounds.

15 lbs. \$3.30; 50 lbs. \$10.50; 100 lbs. \$20.00.

**Above Prices F. O. B. Salt Lake City.
Purchaser Pays Transportation Charges.**

The Cyclone Seed Sower.

For sowing alfalfa, wheat, oats, barley, rye, grass seeds, etc. The best machine of the kind on the market. The seed is thrown from 8 to 20 feet on each side of the operator, the heaviest seed being, of course, thrown the greatest distance. Fifty acres a day by hand. Do your planting with a Cyclone Seeder.

Only \$1.50 Each. Postpaid, \$1.75.



Grass Seeds

Prices on all Grass Seeds subject to change without notice. Write for special prices on quantities.

WHEN AND HOW TO SOW THE SEED.

The most rapid way of obtaining a grass crop is to sow the grass seed alone without any grain or nurse crop. If this is done early in the spring a nearly full crop of hay or pasture can be had the same year and a heavy one the next year. Many farmers sow grass seeds in the spring with grain to save labor, and as they suppose, to protect the young plants. However, it involves the loss of a year in either hay or pasture, aside from endangering the grass, and likely losing it altogether. The young plants are in no way protected by the grain, and when this is cut the young grass and clover is very tender, having been shaded by the grain, and the cutting or harvesting of the so-called nurse crop suddenly exposes the young grass to the sun at the hottest season of the year. There is great danger then that it will be burned out. When the grass is sown by itself the young plants are hardened and more able to withstand the hot dry sun.

After the ground is carefully prepared, the seed is sown broadcast, which can be nicely and evenly done and very quickly with the little hand seeders. As grass seed is very fine and should not be covered very deep, the natural covering which may or may not take place after a shower of rain or after the action of early spring frosts, is sometimes sufficient, and sometimes this succeeds perfectly. However, it is best, and usually more certain, to depend upon some other way of covering the seed. A very good way is to roll the land. The pressure of a common farm roller on clover or grass seed, sown on the freshly harrowed soil, covers it slightly and is almost sufficient, besides being one of the best means to insure the quick and even germinating of the seed. Another good way to cover the fine seed is to pass an evenly made brush harrow over it.

Red Top.

(*Agrostis vulgaris*.) It is a good, permanent grass, standing our climate well, and makes good pasture when fed close. Is valuable for low, wet meadows, producing a large return in good hay. When sown alone, use about twenty pounds of the unhulled seed per acre. Sow in spring or fall.

Red Top Fancy (cleaned from chaff). Sow eight to ten pounds per acre. **Lb. 35c, postpaid;** for larger lots inquire for prices.

Timothy.

(*Phleum pratense*.) This is the most valuable of all the grasses for hay, especially in the North. Thrives best on moist, loamy soils of medium tenacity. It should be cut just when the blossoms fall. Sow early in the spring or fall, at the rate of 12 pounds per acre, if alone, but less if mixed with other grasses.

Lb. 25c, postpaid; 100 lbs. at market price.

Meadow Fescue, or English Blue Grass.

(*Festuca pratensis*.) A perennial, from two to four feet high, with flat, broad leaves. One of the standard European grasses. It needs rich ground and succeeds well on prairie soil. An excellent pasture grass to take the place of the wild grasses, as it yields a large amount of early and late feed. Sow about twenty-five pounds per acre. **Lb. 30c, postpaid;** for larger lots inquire for prices.



TIMOTHY.

Orchard Grass.

(*Dactylis glomerata*.)

For pasture and hay land a most valuable grass, and on account of its earliness very valuable for permanent pastures. When grown for hay, more than one crop can be obtained in one season, and where but one crop is taken the after growth is very heavy, and gives splendid and rich pastures till late in the fall. It is much given to growing in tufts, and is therefore not adapted for sowing alone or by itself; but when sown together with other grasses or in Clover-Grass mixtures, a close and even sod can be had. It is well suited to shady places, such as orchards and groves. Although it is adapted for a wide range of soil, and will grow on almost all land, it gives best results on deep rich, sandy loam or clay soils. Sow 25 to 30 pounds to the acre.

Lb. 35c, postpaid; 100 lbs. at market price.

GRASS SEEDS—Continued.

Bromus Inermis.

Also known as Austrian Brome Grass and Awnless Brome Grass.

Of all the varieties of the cultivated grasses this can be considered the best and most promising for this country. It is a native of Europe, but it is not a new and untried variety in this country any more. It has been sown and tried in nearly all parts of the country and proved to be well adapted for different conditions of soil and climate. It is well suited for hay or pasture, and will produce a very heavy yield of both. It comes up early in the spring, makes a rapid growth, can be cut for hay early, and used for pasture afterwards, making abundant pasture. It remains fresher and greener during the larger part of the year than almost any other grass. It is thoroughly permanent and very hardy, enduring very low temperature in the winter and having great power to grow in dry climates and resist drought and thrive and give abundant pasture or hay crops in dry seasons, when everything else would fail. It will grow on all kinds of soil. All kinds of stock eat it greedily, and it is very rich in nutritive value or flesh forming ingredients. It is easily cultivated, since it is suited to all soils. It is sown early in the spring in the same way as other grass seeds, and since it is rather slow to start and does not make much growth the first year, is well suited to sow with grain for a nurse crop. About 25 to 30 pounds of seed should be sown per acre. It grows two to four feet high, flowering in June and is a true perennial.

Lb. 25c, postpaid; 100 lbs. at market price.



BROMUS INERMIS.

Tall Meadow Oat Grass. (*Avena elatior*.)

For either hay or a permanent pasture a most valuable grass, which can be successfully grown in all parts of the country. It will not winter-kill, and will live and endure our cold Northern winters, and can also be successfully grown in parts of the country where it is sometimes very hot and dry. It starts very early in spring, and is a very valuable pasture grass on this account. Succeeds best in deep, rich, sandy soil, and even on clay and heavy dry soil it does well. It is a true perennial, growing three to five feet high, flowering in May or June. Sow twenty to twenty-five pounds to the acre.

Lb. 35c, postpaid; 100 lbs. at market price.

Sudan Grass.

The Best Forage and Hay Crop for Dry Regions.

This grass was originally introduced into the United States about 1909, from The Sudan, Egypt. The results of early experiments warranted the handling of the seed in commercial quantities, especially in the Southern States, where it has become very popular. It is particularly suited for sections deficient in rainfall; has all the good qualities of Johnson Grass without the objectionable features, but, unlike Johnson Grass, it is an annual and must be planted each season, and does not spread and become a pest. The quality of Sudan Grass Hay is considered equal to Timothy. It yields from **two to four tons per acre without irrigation**, and with irrigation, of course, would run much higher. The seed should not be planted until all danger of frost is past and the ground thoroughly warmed, as the young plant is more tender than Sorghum. The crop matures in seventy to eighty days from the time of planting. The earlier the planting the more opportunity of several cuttings during the season. It can be grown in rows 20 to 30 inches apart and cultivated like corn, or could be sown broadcast by hand. Seeded in rows 30 to 40 inches apart, two to three lbs. per acre of seed is sufficient. Drilled or broadcasted, 18 to 20 lbs. per acre are required. The cutting of the grass for hay should be done as soon as the grass is fully headed; a new crop will then start again from the same plants. On account of the readiness with which Sudan Grass crosses with all varieties of Sorghums, it should never be planted near any of these crops, especially when grown for seed purposes.

Lb. 35c, postpaid; 100 lbs. at market price.

GRASS SEEDS—Continued.



ITALIAN RYE GRASS.

English Rye Grass.

(Or Perennial Rye Grass.) Especially adapted for pastures; will endure close cropping, is of strong and quick successive aftergrowth. It produces an abundance of foliage, which remains bright and green throughout the season, and for this reason is also much used for lawn grass mixtures. It is also well adapted for permanent meadows, and it yields large quantities of very nutritious hay, which is well liked by all kinds of stock. It grows well on almost any land, but prefers medium rich or moist land, such as will produce a good crop of corn, and gives the heaviest yields on such land. It grows two to three and one-half feet high. When sown by itself, about 20 to 25 pounds of seed per acre is sufficient.

Lb. 25c, postpaid; 100 lbs. at market price.

Extra Fine Mixed Lawn Grass.

(City Park Mixture.) The essentials for a fine lawn are: First, a rich, well-drained soil; second, careful preparation of the ground, making it as fine and smooth and mellow as possible; third, a wise selection of seeds; fourth, sowing at such a time as to give the young plants a chance to become well established before being subjected to very dry or to very cold weather. However much care is bestowed on the soil and seed, no lawn will be beautiful without frequent mowing and rolling. Too much care cannot be bestowed upon the selection of grasses, as some varieties are the most luxuriant in spring, others in summer, others again in autumn, and a combination of the proper sorts is required for a perfect, carpet-like lawn. We have given much thought and made many experiments to secure the best selections, and think our City Park Mixture is the best possible for permanent lawns. It may be planted early in spring, or fall, and should be sown at the rate of 60 to 100 pounds per acre; much more is required than for hay or pasture. If sown in the spring, sow as early as possible, making the surface very fine and smooth, then raking it over and sowing the seed just before a rain, which, if the surface has just been raked, will cover the seed sufficiently. If the expected rain does not come, cover by rolling with a light roller. If sown in the fall, sow before the autumn rains have ceased, and before very cold weather give the young grass a light dressing of manure. One pound of this mixture is sufficient to sow 200 square feet.

Extra Fine Mixed Lawn Grass, per lb. 45c, postpaid; 100 lbs. at market price.

Italian Rye Grass.

(*Lolium Italicum.*) It grows on almost any soil, but thrives best in rich, moist land. Where the ground is favorable, and especially if irrigated, immense crops can be produced, being cut four to five times, and yielding as high as seven to eight tons of dry hay per acre. It is well adapted for pastures, on account of its early growth in spring, and its quick and successive aftergrowth, when closely cropped. It grows two to four feet high, with an abundance of foliage, and is much liked by cattle and stock generally. Sow 20 to 25 pounds of seed to the acre.

Lb. 25c, postpaid; 100 lbs. at market price.

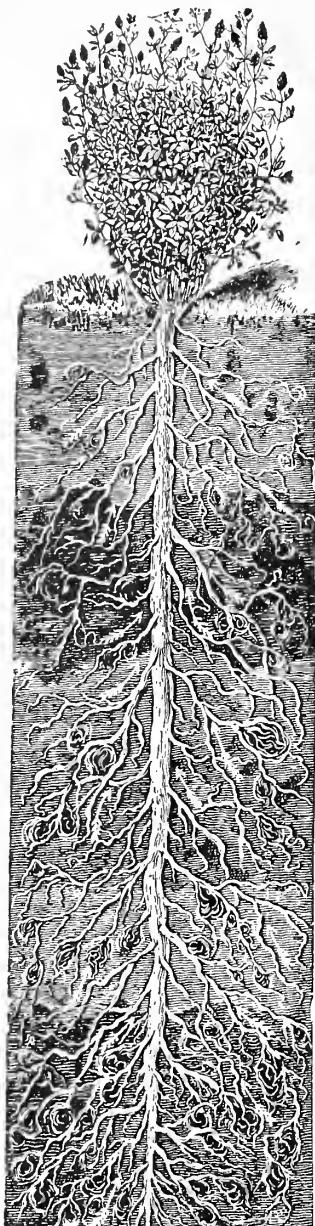
Kentucky Blue Grass.

(*Poa Pratensis.*) The most widely known of all the natural grasses. It does well everywhere, and can be found in almost every part of our broad country. It is suited to any variety of soil, and seems to succeed best on moist, rich land. It requires about two years to become well established, and for this reason should be used only where permanent pastures and meadows are wanted. In conjunction with white clover it forms a splendid lawn; for this purpose use one pound to 200 square feet, or sixty pounds of Blue Grass and six pounds of white clover per acre. If sown by itself for pasture, about thirty pounds per acre will be required. Sow early in the spring or in October or November.

Lb. 35c, postpaid; 100 lbs. at market price.



ENGLISH RYE GRASS, OR PERENNIAL RYE GRASS.



ALFALFA OR LUCERNE.

Clover Seeds

Prices on all Clover Seeds subject to change without notice.

Alfalfa or Lucerne.

The most valuable forage plant, particularly adapted for our Western climate and soil. It requires a deep, mellow soil; newly broken sod does not do so well. It thrives best on a sandy loam (the richer the better), while it has proved a success on heavy, compact clay soil. In the dryest and most sultry weather, when every blade of grass withers, Alfalfa is as fresh and green as in the spring, as its roots go down from ten to twenty feet to the moisture of the ground. Although a prodigious yielder, it does not exhaust the soil, but rather improves the ground by the decay of its long roots, and converts it into rich ground, full of vegetable matter. The seed may be sown early in the spring (as soon as the frost is out of the ground), in order to catch the spring rains, as it needs moisture to germinate. In localities where irrigation is used, it can be sown at any time during the summer months. In our State it is not advisable to sow later than the first part of September on account of early frosts, as the young, tender plants, not having sufficient roots, would succumb to our cold winters. Late fall sowing—say in October or November—is not advisable in localities where wind storms are prevalent during winter and early spring, as the seed will be blown away before it has a chance to take root. Most of our alfalfa growers prefer sowing the seed broadcast, while others are more in favor of drilling it in. If the latter plan is pursued, we advise drilling the seed both length and cross-ways—say half quantity each way—in order to secure a more even stand. There is a great deal of discussion whether the seed should be sown by itself or with other grains, both methods being strongly advocated. Owing to the fact that Alfalfa needs light and sun, the majority of growers suggest sowing the seed by itself, providing it can be put in the ground early in the season, but when the sowing is delayed, we advise to sow oats or barley with it to afford some protection to the young plants against the scorching rays of the sun in midsummer. Another circumstance has to be taken into consideration. If the ground proves to be very weedy, sow in connection with grain, by all means, a crop of barley or oats—they can be raised as well as a crop of weeds. After the grain has been cut, and this should be done as early as possible, it will be found that the Alfalfa has made such growth as to prevent any danger of being choked out by the weeds, and it will care for itself. Irrigate immediately after the grain is cut, and the Alfalfa will push out fresh shoots at once, and will furnish a light cutting in the fall, or at least good pasture. It is more difficult to establish the first year, but will, when once started, produce a profitable crop—under favorable circumstances, three and even four crops are cut yearly, aggregating five to seven tons to the acre. Never sow less than fifteen pounds of good clean seed to the acre, for thin sowing produces thick and coarse stalks, not relished by stock. The Alfalfa flourishes up to an altitude of about 8,000 feet above the sea level; at higher altitudes it is not likely to thrive. How long it will live is a question not settled yet. The reports speak of Alfalfa fields in Chili (whence it was brought to California under the name of Chili Clover) that are several hundred years old, still bearing good crops. The proper time to cut it is when the plant is in full bloom. The seeds ripen to perfection, and are a source of considerable revenue to our farmers. If intended to raise Alfalfa for seed, ten to twelve pounds is plenty to sow on one acre. The seed has to be saved from the first crop, as the second or third cutting does not mature evenly, does not fill out plump and heavy, and does not possess the proper germinating power. It is worthy of trial in any locality where it has not already been tested.

35c per lb., postpaid; 100 lbs. at market price. For larger lots write for prices.

Bokara, Sweet or Bee Clover, (*Melilotus Alba*)

A tall, shrubby plant, with many white flowers of delicious fragrance, on which bees delight to feed. It will grow on poor soil, and can there be sown and plowed under and used as a fertilizer. Sow at the rate of fifteen pounds to the acre.

30c per lb. postpaid; 100 lbs. at market price.

Crimson Trefoil, or Scarlet Italian.

Also called Giant Incarnate, or German Mammoth.

An annual variety in common use in the south for feeding green and for hay. The yield in fodder is immense and after cutting, it at once commences growing again, continuing until severe cold, freezing weather. It grows about one foot high; the roots are nearly black, leaves long, blossoms long, pointed and of very deep red or carmine color. Makes good hay. Sow ten to fifteen pounds per acre.

Lb. 30c, postpaid. For larger lots write for prices.

CLOVER SEEDS—Continued.

Alsyke, or Swedish.

The advantages which the Alsyke Clover has over Red Clover and other varieties are its hardness and true perennial character. It will adapt itself to a great variety of soils, growing on the edge of a stream or in a swamp and on low ground, and yet flourish on dry and stubborn, stiff clays and upland soils. It is capable of resisting the extremes of drought and wet alike. It is well liked by all stock, either green in pasture or cured for hay. Horses, cows and sheep prefer it to Red Clover. It makes finer and better hay as the stocks are not so thick and woody as those of Red Clover. It is very sweet and fragrant, and liked by bees. Grows fifteen to twenty-four inches high, heads are rounded, flesh-colored. It can with advantage be sown together with Timothy, as both will grow on low ground and moist soil and mature and ripen together at about the same time. If grown for the seed, this is taken from the first cutting.

When sown by itself, six pounds of seed are required per acre.

Lb. 35c, postpaid; 100 lbs. at market price.

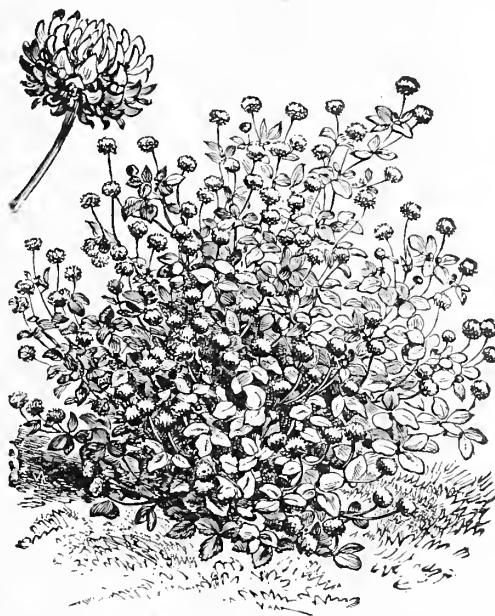


MEDIUM RED, OR JUNE.

White, or Dutch.

A small, creeping perennial variety, valuable for pasture and for lawns. It accommodates itself to a variety of soils, but prefers moist ground. Being very hardy and of a creeping habit, it will also prevent the ground from being washed by heavy rains. It is rarely sown alone, but used mainly for sowing with other grass seeds, especially Blue Grass, to obtain permanent pastures. Sow in the spring, at the rate of six pounds per acre, or when used with other grasses, half that amount.

Lb. 70c, postpaid; 100 lbs. at market price.



ALSYKE.

Medium Red, or June.

This is by far the most important of all the varieties for practical purposes. Sow in the spring or fall, and if no other grasses are used, at the rate of twelve to fifteen pounds per acre; more is required on old, stiff soils than on new and lighter ones.

Lb. 35c, postpaid; 100 lbs. at market price.



WHITE OR DUTCH.

Miscellaneous Field Seeds

Prices on all Field Seeds subject to change without notice. Write for special prices on quantities. Pound prices include postage, but larger lots sent at Buyer's Expense.

Alfileria (Erodium Cicutarium.)

One of the most nutritious of fodder plants and well liked by cattle and horses. Alfileria will thrive and make a good pasture on dry hillsides. Sow 20 lbs. per acre. **¾ lb. 50c; 1b. \$1.50, postpaid.**

Barley.

Barley succeeds best on rich lands, more sandy and lighter than those adapted to wheat. It is sown in the spring and can be grown farther north than any other grain. Unless intended for seed it should be cut before fully ripe as it is then heavier, of better quality, and less liable to shell. Use about two and one-half bushels per acre. **White Club \$2.00 per 100 lbs.; Utah Blue, \$1.85 per 100 lbs. Bald or Hulless, \$2.50 per 100 lbs.** For larger lots, write for prices.

Buckwheat (Japanese.)

The best and most profitable variety. It is earlier than Silver Hulled and usually more productive. Is also excellent for bee pasture. Sow 25 lbs. per acre. **Lb. 20c, postpaid.**

Cow Peas.

Used largely for green manure. It is also valuable if allowed to mature the seed, when the dry vines can be plowed under and the seed used to grind as feed for stock. If for green manure, sow broadcast, using 80 lbs. per acre. If for seed or fodder, sow in rows three feet apart, using 40 lbs. per acre. Sow late in the spring. **Lb. 20c, postpaid.**

Emmer.

It is adapted to a wide range of soil and climate, and is of superior feeding value, yielding much more heavily than oats and barley. This grain grows tall, like rye, and matures as early as barley, and yields from 40 to 80 bushels to the acre, and from four to six tons of straw hay. Tough and hardy, it stands the drought better than any other grain, making it a sure crop. Prepare your land as you would for wheat or oats, and sow at the rate of 75 or 100 lbs. per acre. Sow very early in the spring or fall, and do not let it stand until it gets too ripe before cutting as any grain that yields well, shells easily. In the green state it makes excellent pasture. **Lb. 20c, postpaid. Lb. 10c; 10 lbs. 60c; 100 lbs. \$5.50.** By Express or Freight at buyers expense.

Flax Seed.

Should be sown in the spring on moist land, using 30 pounds of seed per acre if grown for a seed crop, or twice that quantity if intended for a crop of fiber. **Lb. 20c, postpaid.**

Field or Stock Peas.

These are very valuable for fattening stock, and can also be grown for soiling purposes, but are of greater value for fodder when fed as ground feed, or the vines can be fed for hay, which is of great nutritive value for dairy cows and hogs. They are equal to corn and six weeks earlier. Field Peas have been grown by dairymen with very satisfactory results, following Winter Rye, which was cut green in June for dairy cows and cattle, then stubble turned under and sowed to mixed Peas and Oats, furnishing a large amount of forage in August, when grass pastures are usually short. The Field Pea does well on any soil adapted to Oats and Spring Wheat. Cut and feed green, or, if for hogs alone, can be used as pasture. These peas should not be grown on very rich soil, as they will run to vine instead of pod, unless grown for renovating purposes. As a fertilizer they come next to clover, to be plowed under when they commence to blossom. Can be sown separately in drills or broadcast, 100 to 120 lbs. to the acre; or with Oats, 90 lbs. of Peas and 50 lbs. of Oats to the acre. **Lb. 15c, postpaid; 100 lbs. \$4.25.**

Kaffir Corn.

Grows from 6 to 10 feet high and thrives in hot, dry climates. Makes good fodder for cattle, and the seed is used for stock and chicken food. Sown in rows 3 feet apart, using 6 to 8 pounds per acre. **Lb. 15c, postpaid; 100 lbs. \$3.00.**

Feterita.

Feterita is a new combination grain and forage plant introduced into the United States a few years ago from the Sudan region in Central Africa. Feterita has proven to be the best and most valuable combination grain and forage plant ever produced here, especially in localities subject to drought. It grows 5½ to 8 feet high. It is planted and cultivated similar to Kaffir Corn, and ripens 20 to 50 days earlier. **Lb. 20c, postpaid.**

FIELD SEEDS—Continued.

Millet (German or Golden.)

Probably no other plant is so popular and well known as Millet. When drought is cutting the hay crop short, it can be sown to make up the shortage.

Requires a dry, light, rich soil and grows three to five feet high. The heads are closely condensed, though the spikes are very numerous with a fine bulk of stock and leaves, and is excellent for forage. The seeds are contained in rough, bristly sheaths and are round, golden yellow and beautiful in appearance. For hay, sow broadcast at from twenty-five to thirty pounds to the acre, from May 1st to August 1st. For grain, sow in drills, about fifteen pounds to the acre, and not later than June 20th. Lb. 20c, postpaid; 100 lbs. at market price.

Silver Mine Oats.

This oat has made for itself a reputation as an exceedingly heavy and reliable yielder. It is very hardy and prolific and yields beautiful white kernels which are especially desirable for the manufacture of rolled oats. The heads are very large in proportion to its stiff, bright, clean straw. The sprangle top heads, although long, are borne low down on the stalk, which seems to prevent lodging. The straw is valuable for feed and for bedding. As a rule, oats yield a greater profit per acre than wheat, and they are also a more reliable crop.

Per 100 lbs. \$2.25. Write for prices on larger lots.

Rape (Dwarf Essex.)

A biennial crop, used principally for sheep pasture, of which it yields an abundance of the best quality. Is usually sown broadcast on ranges, using 4 to 5 lbs. per acre. Lb. 25c. postpaid.

Spring Rye.

This variety has been developed simply by planting Winter Rye in the spring and selecting the seed so produced for several years. The standard variety for spring planting. Sow about 1½ bushels to the acre. Per 100 lbs. \$2.75, not prepaid.

Winter Rye.

Grown for hay by dairymen, but principally for grain; is also planted with Vetch, and in combination makes an excellent fodder. Per 100 lbs. \$2.00.

Sugar Cane (Sorghum), Early Amber.

A good fodder if cut when two feet high. Is nutritious and yields a heavy crop. Sow late in April, using ten pounds seed per acre in drills, or twenty-five pounds broadcast.

Lb. 20c, postpaid.

Sunflower (Large Russian.)

A variety bearing large heads, frequently 12 to 20 inches in diameter and sometimes yielding 1000 pounds of seed per acre. The seed is used for feeding chickens and parrots. Sow in the open field as soon as danger from frost is over, using 3 pounds of seed per acre, sowing in rows 5 feet apart and thinning to 1 foot. Lb. 25c, postpaid.

VETCHES OR TARES.

Spring (Vicia Sativa.)

A perennial pea-like plant grown as an annual in the north. Desirable as a forage plant, and valuable as a cover-crop for orchards. Culture same as for field peas. Sow two bushels per acre. Lb. 20c, postpaid; for larger lots write for prices.

Wheat

SONORA. A very popular spring variety. Per 100 lbs. \$2.50.

TURKEY RED (Winter). Used for blending in the manufacture of flour, on account of its hardness and high gluten content; it has also become very popular for poultry feeding; also for ploughing under as a green manure. Per 100 lbs. \$2.50.

GOLD COIN. The standard white wheat for fall planting. Per 100 lbs. \$2.25.

MARQUIS WHEAT. An excellent spring wheat, very popular with the millers. In appearance Marquis Wheat is similar to Red Fife, but the heads are heavier and the stalks shorter, making it less likely to lodge. The kernel is flinty, a little darker red and more plump than Fife. It is beardless, having smooth yellow chaff, but its most valuable feature lies in its earliness as it matures a week or ten days earlier than Red Fife. Yields 40 to 50 bushels per acre. 100 lbs. \$3.00

Poultry Supplies

STRICTLY CASH WITH ORDER.

Poultry Supplies will be sent by Express or Freight at purchaser's expense, except where quoted by mail postpaid.

CYPHERS FIRE-PROOFED INSURABLE INCUBATORS.

The Business Incubator of the Age.

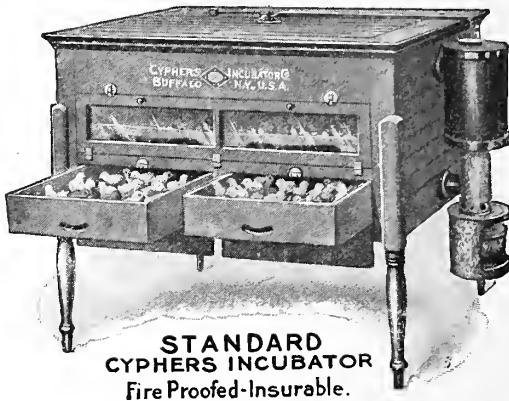
The Cyphers represents the highest degree of excellence yet achieved in incubators, both in principle and in mechanical construction. It overcomes practically every defect, every inconvenience and every objection urged to artificial incubation as performed by machines of other types. It not only is more convenient to operate; it not only consumes less oil; it not only is safer; it not only hatches a larger percentage of the eggs entrusted to it, but it produces larger, stronger, healthier and more vigorous chicks and ducklings than any other incubator ever built.

Buy the Incubator that has stood the test of hatching year after year and is acknowledged to be the best by the most successful poultrymen—those who have made money in the business.

Cyphers Incubators are used by more government experiment stations; large practical poultry plants; leading fanciers and exhibitors, and large successful duck farms than all other makes combined.

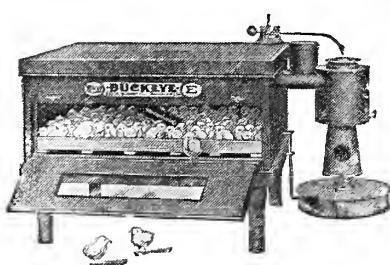
SIZES AND PRICES.

No. 0—Holds 70 Eggs.....	\$16.00
No. 1—Holds 144 Eggs.....	25.00
No. 2—Holds 244 Eggs.....	37.50
No. 3—Holds 390 Eggs.....	44.00



BUCKEYE INCUBATORS.

The World's Best Hot Water Incubator.



Double walls throughout, complete with Nursery. Guaranteed by the Manufacturers to hatch a chick from every hatchable egg.

Equipment.—One tank and boiler, one lamp, one burner with wick, one chimney, one thermometer, one thermometer holder, one complete Buckeye regulator, one egg tester, two egg trays and one nursery tray.

PRICES AND SIZES.

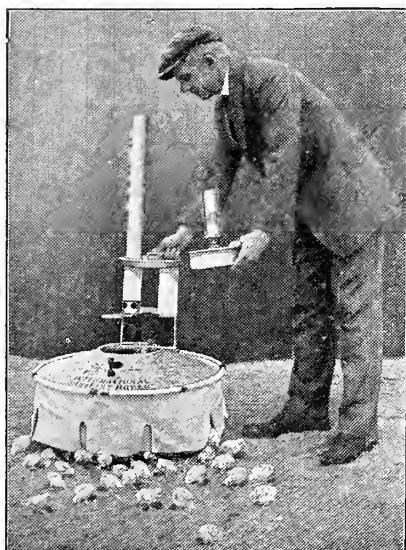
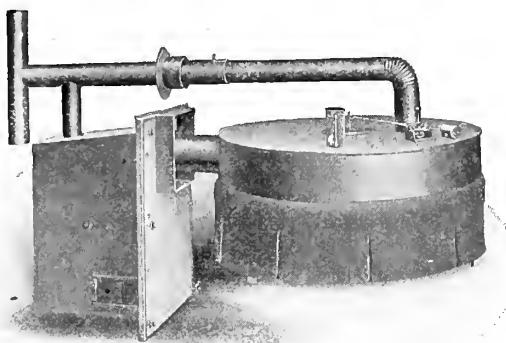
Style A—60 Eggs.....\$ 8.00 Weight 60 lbs. Standard No. 2—175 Eggs, \$22.50 Weight 135 lbs.

Cyphers Adaptable Hover.

Cyphers Adaptable Hover is Self-Ventilating and Self-Regulating—used in all Cyphers Brooders, also intended to be used as a brooding device in Colony coops, in portable houses, and in home-made Brooders, such as goods boxes, piano boxes or organ cases, and can be adapted to other makes of Brooders, provided they are 26 inches high and of fairly large dimensions otherwise.

The Adaptable Hover is especially recommended for use in continuous brooding houses, containing pens or chick runways, side by side.

Price, \$10.50.

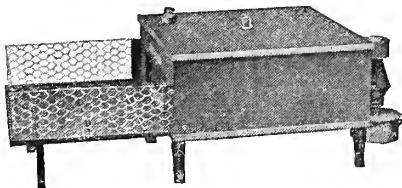


International Sanitary Hovers.

The International Sanitary Hovers have stood every climatic test, from Panama to Quebec. Practical poultrymen, State experiment stations, and poultry judges endorse it. You can raise chicks anywhere with International Sanitary Hovers. No specially constructed houses are necessary. There is no better place than in your regular hen-houses.

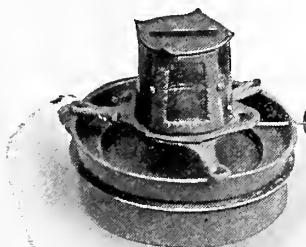
Sanitary Hovers are as practical for the small back-yard poultry raiser as for large poultry farms. They are warmest at the curtain—usable anywhere—ready for business wherever placed. No crowding or smothering of chicks—no kneeling in mud to get at the lamp—no cutting of holes or building of platforms. You want the best Brooding device—you will get it in the Sanitary Hovers.

Price, \$9.50.



BUCKEYE BROODER

No. 1—Indoor Type; capacity, 50 chicks. Complete, ready for use, price \$5.00



Cyphers Safety Brooder Stove.

The Safety Water Pan on the Cyphers Safety Brooder Stove holds nearly a quart of water, and extends out over the entire surface of the oil bowl, thus placing a sheet of cold water between the oil bowl and the flame jets. We have sold thousands of these to persons who build home-made Brooders, and they give general satisfaction. Height, 7½ inches; greatest width, 10½ inches.

Price, \$2.00. Postpaid, \$2.25.

MOE'S SANITARY POULTRY DRINKING FOUNTAIN



The most popular fountain
on the market
Sanitary, simple
humane



If sent by mail, postpaid, No. 1, \$1.50; No. 2, \$2.10; No. 3, \$2.65.

Fills from the top. Dead air space keeps water cool in summer and from freezing in winter. Can be used for two pens at the same time. Manufactured in three sizes.

No. 1, 1 gallon capacity.....	\$1.25
No. 2, 2 gallon capacity.....	1.75
No. 4, 4 gallon capacity.....	2.25

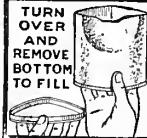
Can be hung up out of the litter. Very easy to fill. A strong, substantial wall fountain at a low price. This fountain appeals to many breeders and is especially adapted for watering pigeons.

If sent by mail, postpaid, No. 25, 45c;
No. 26, 70c.

MOE'S WALL FOUNTAIN

LAY DOWN TO FILL	No. 25, $\frac{1}{2}$ -gallon capacity	\$3.35
WHEN FILLED, HANG UP, THEN READY FOR USE	No. 26, 1 gallon capacity50

MOE'S SANITARY BROODER FOUNTAIN



If sent by mail, postpaid, No. 0, 35c; No. 5, 70c.

No. 0 is just the thing, for owing to its three-cornered shape, it takes very little room in the corner of your brooder. Impossible for chicks to upset it or get themselves wet. No. 0—1 quart. Price, each.....25c Packed in corrugated containers holding one dozen fountains.

No. 5 is fine for half-grown chicks or full-grown fowls.
No. 5—1 gallon. Price.....50c
Packed in corrugated containers holding four fountains.

Will fit pint, quart or one-half gallon Mason jar. Manufactured of one piece of non-rusting metal. No parts to come unsoldered. Leaking impossible. Convenient, cheap and sanitary. Provides greater drinking surface than the round fountain. Little chicks cannot get drowned. Can be used for feed as well as water. Manufactured in one size only.

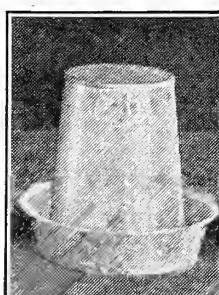
MOE'S STAR JAR FOUNTAIN AND FEEDER



No. 32 ..\$.10 each
By mail, postpaid,
20c each, or 6 for
\$1.00.



Galvanized Iron Drinking Fountains.



The water supply is often the medium that conveys contagious disease from one fowl to another. In the drinking vessel it comes in contact with and is infected by the discharge from the nostrils of roupy fowls and those having canker and chicken pox, and other head and throat diseases. It is essential, therefore, that the drinking fountain shall be not only a suitable vessel for holding water, but it should also be easy to clean, and of such material and construction that it may be easily kept clean. These fountains are made of heavy galvanized iron, all seams being carefully turned and soldered. Small size, 1 quart (for chicks), 25c, postpaid 35c; medium size, 2 quarts (for growing chicks or ducklings), 35c, postpaid 45c; large size, 3½ quarts (for fowls), 45c, postpaid 60c; special duck size, 2 gallons, 65c, postpaid 80c.

Feed Trough.

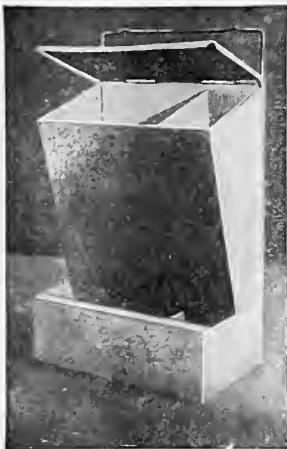
This Feed Trough is a most desirable appliance for use on the poultry plant. Easy to fill; economizing labor; saving time. Made in two sizes, suitable for all ages and all kinds of poultry. Small size, 5½x24 in., 1-in. deep, with rounded edge; suitable for feeding or watering small chicks; medium size, 6x24 in., 2 in. deep, with smooth lip edge; suitable for feeding or watering growing chicks or ducklings. Consists of a heavy galvanized iron pan with an adjustable wire netting top. This top protects the grain mixture, or dry mash from waste.

Prices: Small size, 60c each, postpaid 70c; medium size, 85c each, postpaid \$1.00.



Dry Food Hopper.

Dry feeding has become very popular. It has proved to be a satisfactory, economical and labor-saving method of feeding poultry. This hopper is well made of heavy galvanized iron and, with ordinary care, should last a lifetime. These hoppers have two compartments, one for dry mash or mixed grain, holding about six quarts; the other for either grain or beef scrap, holding about three quarts. We recommend this hopper for all who desire to practice dry feeding or who wish to give the birds a chance to balance their own ration. Price, each 75c, By mail, postpaid, 90c.



MOE'S FEED SAVING HOPPER



Cuts down your
feed bill.
Improves the
quality of your
birds.



Feed can't clog on account of simplicity of construction.

Manufactured in one size only.
No. 6 Feed Saving Hopper, capacity 4/5 bu.
Price \$1.50
By mail, postpaid, \$1.90.

MOE'S NEVER CLOG AND WASTE PROOF HOPPER



Large in capacity
and small in
price.



This hopper is constructed on a principle hitherto unused. Does away with all trouble of feed clogging no matter how coarse. The gradual enlargement to the base together with the vibration of the fowls feeding from the trough will force the feed downward. It is a great feed saver. A trial will convince you that it is a hopper of the greatest merit. No. 36—18 quarts capacity \$1.00
By mail, postpaid, \$1.40.

Grit, shell and charcoal has now become a recognized essential part of the diet, insuring healthy fowls, and it cannot be more economically supplied than in one of these triple compartment boxes.

No. 9, Moe's Grit Box, capacity about $\frac{1}{4}$ bushel \$0.50
By mail, postpaid, 65c.

High Grade Tested Thermometers.

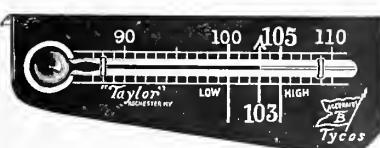
The best incubator or brooder manufactured is useless unless the thermometer used therein is accurate. Hundreds of hatches in incubators fail because of inferior thermometers, and large numbers of chickens are killed in brooders owing to defective or worthless thermometers. The operator, to be successful, must know the exact temperature in the egg chamber of the incubator, and be sure that the chickens in his brooder have the proper amount of heat. The thermometers here listed are manufactured especially for us, and are thoroughly tested before they are shipped.

Prices: Incubator Thermometers, each, 70c; postpaid, 75c. Brooder Thermometers, each 70c, postpaid, 75c.

MOE'S GRIT AND SHELL BOXES



Can also be used
as a Feed Hopper
for little chicks.



INCUBATOR THERMOMETER.

Incubator Hygrometer.

Millions of chicks die in the shell every year for the want of proper moisture conditions. The importance of a correct percentage of moisture during incubation has made the Incubator Hygrometer as necessary as the Incubator Thermometer. Neither takes the place of the other, but together they give the practical poultry raiser all the facts required for successfully regulating the heat and moisture of an incubator.

The Incubator Hygrometer is not a regulator of moisture, but in conjunction with the Incubator Thermometer is an indicator of moisture present in the incubator, showing exactly what the conditions are, so that if not correct, they may be made so.

\$1.50 each. Extra wicks, 10c each; \$1.00 per doz.
By mail, postpaid, \$1.60.



INCUBATOR HYGROMETER.



Standard Egg Tester.

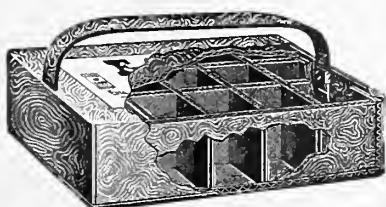
This tester gives a strong, reflected light, and when used in a dark room illuminates the interior of the egg sufficiently for practical work.
Price 25c; by mail, 35c.

Porcelain Nest Eggs.

These articles do not need any description, as they are well known to all who keep poultry. They are made of a good quality of flint glass and will last indefinitely. Price, two for 5c; per dozen, 25c. By mail, postpaid, 35c.

Shipping Boxes for Day-Old Chicks.

Made from the same grade of corrugated paper as the Eyrie Coop body and the Egg Boxes. For shipment it is folded flat, but can be easily set up and made ready for use. Dead air cells in the paper protect the tender chicks. Made to hold 25, 50 and 100 chicks. Each box is divided into compartments that will hold about 25 chicks. As this box is so much lighter than a wood box in many instances the amount saved in express charges alone will pay for the box.
25-chick size, 20c each; 50-chick size, 30c each;
100-chick size, 50c each.



Eyrie Egg Boxes.

The Eyrie Egg Box is made for the purpose of shipping settings of high-class eggs, and is made from brite board, lined throughout and partitioned with double-faced corrugated paper, which incloses the eggs in a dead air space, effectually protecting them from sudden changes of temperature. The cushioning effect of corrugated paper affords ample protection, and the partitions allow of a change in position of the germ. The handle is a very important feature. It serves to prevent the express agent from taking hold of the body of the box and pitching it around, since he will naturally take hold of the handle and pass it on.

It further prevents the placing of other express packages on top of the box. The automatic locking of the box is accomplished by the insertion of a notched handle in two holes at the ends of the box, the tongue on the handle slipping into the metal catch, which holds it firmly. To open the box it is necessary to cut off the handle.

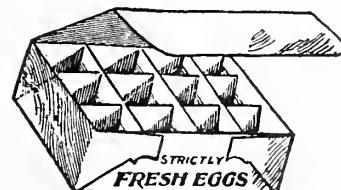
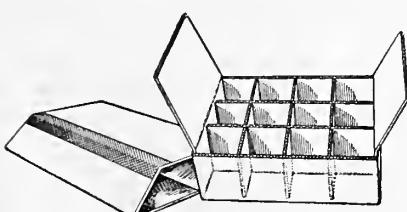
Prices: No. 1 (holds 15 eggs), 20c. By mail, postpaid, 30c. No. 2 (holds 30 eggs), 30c. By mail, postpaid 40c.

Paper Egg Boxes.

Just the Thing for Your Family Egg Trade.

These boxes are intended for use in delivering eggs to private families. They are exceedingly neat in appearance and go a great way toward making satisfied customers. They ship "knocked down," can easily be set up and sent by express or freight at very low rates. The customer, after using contents, can take them apart and return them.

Prices: 1 doz. size, per doz., 15c; per 100, \$1.10; per 250, \$2.50; per 1,000, \$9.00. By mail, postpaid, 45c per dozen.



Parcel Post Egg Box.

This box is intended for the shipment of Eggs by Parcel Post. Each Egg must be wrapped with cotton, excelsior, newspapers tissue paper or material of a similar nature when shipped in our boxes and box so wrapped that nothing can escape from the package. Any commercial wrapping paper is acceptable. 1 doz. size, 10c each. 90c per doz.; by mail postpaid, \$1.10.

Vogeler's Perfect Chick Food

A Complete and Scientifically Compounded Food for Baby Chicks.

Vogeler's Perfect Chick Food is a mixture of many different grains and seeds, so proportioned to the needs of the growing chick that it will be fully nourished. By the term "fully nourished" we mean a great deal. Most feeding stuffs contain too much fat-forming and not enough flesh-and-muscle-forming elements; in consequence the chick develops indigestion and diarrhoea, which ultimately means no digestion at all, and the chick soon starves to death. Or, if partially nourished, leg weakness develops and the chick drags out a miserable existence.

In compounding Vogeler's Perfect Chick Food, the protein or flesh-and-muscle-forming element, is maintained high, the carbohydrate heat-producing and the fat-forming elements are reduced to their proper proportion, and the ash or mineral elements are in sufficient amount to supply the needs of the rapidly growing bird.

Price: 50-lb. bag \$1.60; 100-lb. bag \$3.00. By Express or Freight at Buyer's Expense.

Developing Food.

Invaluable for Hastening the Growth of Young Stock.

Developing food is a special food intended for properly maturing young chicks after they are ready to be weaned from Chick Food, and to carry them along to the age when it is desirable to place before them the larger whole grains. When the chicks are from six to eight weeks old they are able to eat and exhibit a preference for larger particles of grain than found in our Chick Food.

Price: 50-lb. bag \$1.60; 100-lb. bag \$3.00. By Express or Freight at Buyer's Expense.

Laying Food.

A Balanced Ration, Ready Mixed for the Daily Mash.

Laying Food is a palatable and highly nutritious balanced ration, ready for making the daily mash. It is ready mixed with every ingredient necessary for layers. Mash foods should be accompanied by a food that will promote exercise, for which purpose we recommend that Scratching Food be scattered in litter.

Price: 50-lb. bag \$1.35; 100-lb. bag \$2.50. By Express or Freight at Buyer's Expense.

Scratching Food.

An Ideal Dry-Grain Mixture—Affords Variety, Promotes Exercise.

If we were to feed laying stock entirely on mash, or even on grain food in bulk, without the use of litter, this practice would cause inactivity and soon result in over-fat fowls that would not lay. Exercise is necessary to produce good digestion, maintain health and insure a heavy egg yield. Remember, too, that breeding fowls cannot be kept vigorous and strong by any method that does not require exercise, and plenty of it.

Scratching Food should be scattered in the litter the first thing in the morning and at noon. Late in the afternoon feed all the mash food they will eat up clean.

Price: 50-lb. bag, \$1.30; 100-lb. bag \$2.50. By Express or Freight at Buyer's Expense.

Alfalfa Meal.

A "Green" Food that aids digestion and assists in the assimilation of grain foods, thereby giving better results at lower cost.

The value of alfalfa meal as a portion of the regular diet of fowls can hardly be over-estimated. Its value has long been recognized by poultrymen, and it stands pre-eminent among the grasses as a source of protein, lime and mineral salts in soluble and digestible form; in fact, there is no grass, either green or dry, that approaches it in these particulars. The full feeding value of the grain food is better obtained with the aid of alfalfa. Therefore, it is best to feed it daily. Alfalfa meal insures a large percentage of fertile eggs, and adds to the luster of plumage. When to be used with the mash, alfalfa meal is mixed dry with the other foods, then scalded or boiled with them, as the poultryman desires. When fed alone it should be scalded and left in a trough for the fowls to eat at will.

Put up in 100 pound bags, \$1.25 each. By Express or Freight at Buyer's Expense.

Meat Scraps.

THE GREATEST CHICK GROWER AND EGG PRODUCER ON EARTH.

Beef scraps are rich in materials which make bone, muscle and lean meat. They insure health, thrift and vigor and satisfy the natural craving of the bird's system for flesh-food in some form. No other meat-food is so highly concentrated and no substitute is so convenient for handling and storage. Will keep in any climate under all conditions.

Lb. 5c; 25 lbs. \$1.15; 50 lbs. \$2.15; 100 lbs. \$4.00. By Express or Freight at Buyer's Expense.

Blood Meal.

One of the best preparations to make hens lay, chicks grow fast and to keep fowls healthy. A small quantity should be fed to the poultry occasionally to keep them in good health. Should never be fed without mixing with other food in proportion of 1 to 15 parts of meal or shorts.

Lb. 6e; 25 lbs. \$1.35; 50 lbs. \$2.50; 100 lbs. \$4.75. By Express or Freight at Buyer's Expense.

Meat Meal.

This food is made from pure, sweet meat, blood and the liquor from cooking. It is rich in albumen and protein, and is a nitrogenous food of great egg-producing value.

Lb. 5e; 25 lbs. 90e; 50 lbs. \$1.85; 100 lbs. \$3.50. By Express or Freight at Buyer's Expense.

Crushed Oyster Shell.

The most frequent cause of hens not laying is the absence in the food of carbonate of lime. As crushed oyster shell is practically pure carbonate of lime, it supplies, when fed to poultry, the most essential element and greatly aids in the formation of the egg and is a general promoter of good health. Lb. 2½e; 25 lbs. 50e; 50 lbs. 85c; 100 lbs. \$1.50. By Express or Freight at Buyer's Expense.

Ground Bone.

Our bone is made from fresh green bones from which the moisture and grease have been taken, leaving nothing but the phosphates, lime and protein. These are the only food properties of bone, green or dry, so when you buy our bone you get it without paying freight on moisture or grease. State whether fine or coarse ground is wanted. We keep them both.

Lb. 5e; 25 lbs. \$1.00; 50 lbs. \$1.85; 100 lbs. \$3.50. By Express or Freight at Buyer's Expense.

Poultry Grit.

It is highly essential that poultry be given a plentiful supply of good, clean, sharp, and lasting grit. Fowls cannot be healthy if grit is denied them. Our grit is made in three sizes: Fine for chicks, medium for fowls half grown, and coarse for grown fowls, turkeys, etc.

Put up in burlap sacks. State the size grit required when ordering. All sizes are the same price and the same in quality. Lb. 2e; 25 lbs. 40e; 50 lbs. 70e; 100 lbs. \$1.25. By Express or Freight at Buyer's Expense.

Charcoal.

To keep fowls in a healthy state a regulator of some kind must be fed. Nothing takes the place of charcoal in this respect, as it purifies the blood, aids digestion and tones up the whole system. No matter whether your fowls are young or old, give them an occasional feed of charcoal. Two sizes, fine and coarse. Put up in 2-lb. paper cartons, 15c each; if postpaid, 30c each. Also packed in 50-lb. bags, \$1.50 per bag; \$2.90 per 100 lbs. By Express or Freight at Buyer's Expense.

Cottonseed Meal.

Aids digestion and assimilation of food. As it contains 40 per cent of protein, it is combined with grains and other food so as to make a balanced ration. Improves the health, vigor and appearance of poultry. Lb. 4e; 25 lbs. 90e; 50 lbs. \$1.70; 100 lbs. \$3.25. By Express or Freight at Buyer's Expense.

Dried Beet Pulp.

Feed Dried Beet Pulp to your hens and watch your egg production grow. It is a handy "green" food that is never missing and always certain to promote health and activity. Good for every class of stock—horses—sheep—hogs and dairy cows. Price, per 100 lbs. \$2.00. By Express or Freight at Buyer's Expense.

Vogeler's Poultry Food.

It is estimated that one-half the chicks and turkeys annually hatched die before reaching maturity. When Vogeler's Poultry Food is fed according to directions, sick and drooping chicks will never be seen. It supplies all the needed material for forming bone, muscle and feathers, and by its gentle tonic effect strengthens the digestive organs and lays the foundation for vigorous, healthy, and therefore profitable fowls. Pkg. 25c; (postpaid, 40c.)



It positively cures and prevents chicken cholera, roup, and all diseases.

It makes young chickens grow quickly and profitably.

It will increase the quantity of eggs.

It will make turkeys, ducks, geese and pigeons thrive.

It will help moulting fowls and make them lay sooner.

Feed it to the worst run-down fowl in your flock; the result will more than please you.

Try it; if not on all your chickens, separate a few, and the astonishing results will make it profitable to use always.

PRICES.

26-oz. package, 25c by mail, postpaid.....	\$0.35
4-lb. Package, 50c, by mail, postpaid.....	.70
9-lb. package, \$1.00, by mail, postpaid.....	1.35
12-lb. pail, \$1.25, by mail, postpaid.....	1.45
25-lb. pail, \$2.50, by mail, postpaid.....	2.80

Conkey's Poultry Remedies and Insecticides.

Poultry cannot be profitable unless they are in a healthy condition. We offer a specific remedy for each disease. The importance of prevention by the use of a germicide, like Nox-I-cide, should not be underestimated. This line is complete and very reliable.



Conkey's Roup Remedy. For fowls that sneeze, gasp and wheeze, also have a watery discharge from nostrils and eyes. Follow directions on each box and cure will be effected.

Three sizes, 25c, 50c and \$1.00, postpaid.

Conkey's Cholera Remedy. Placed in drinking water. Directions on every box.

Two sizes, 25c and 50c, postpaid.

Conkey's Lice Powder. Will successfully kill body lice on fowls.

15 oz. pkg., 25c (postpaid, 40c); 3-lb. pkg. 50c, postpaid, 70c.

Conkey's Lice Liquid. Will kill mites and acts as a disinfectant. Applied to walls, roosts and crevices with a brush or sprayer.

Qt., 35c; $\frac{1}{2}$ gal., 60c; gal., \$1.00. Cannot be sent by mail.

Conkey's Poultry Tonic. For fowls run down, off feed, recovering from disease or during moulting season.

Price, 25c, (postpaid, 30c.)

Conkey's Laying Tonic. Not a food but a medicinal preparation to increase egg production. Keeps hens in the best laying condition.

1 $\frac{1}{2}$ -lb. pkg., 25c, postpaid 35c; 3 $\frac{1}{4}$ -lb. pkg., 50c, postpaid, 70c.

Conkey's Nox-I-cide. A wonderful disinfectant and germicide. Fine for many purposes—cleaning incubators and brooders, washing founts and troughs and spraying wherever germs are present. Pint, 35c; qt., 60c. Not mailable.

Conkey's Head Lice Ointment is a carefully prepared non-poisonous, semi-liquid article with an agreeable odor, and is very destructive to the murderous lice, while harmless to the little chicks if used as directed. (It is unexcelled for killing lice on little children.) It should be remembered that powders are not effective in killing head lice, and this is the only practical way to reach them. It will pay for itself in saving one chick.

Prices, 1 oz. tube, 10c; postpaid, 12c; 3 oz. tube 25c, postpaid 30c.

Conkey's Bronchitis Remedy. Price, 50c, postpaid, 55c.

Conkey's Limber Neck Remedy. Price, 50c, (postpaid, 55c.)

Conkey's Scaly Leg Remedy. Price, 50c, (postpaid, 55c.)

Conkey's White Diarrhoea Remedy. Price, 50c, (postpaid, 55c.)

Conkey's Fly Knocker.

The Animal's Friend.

Positively kills every fly it hits and keeps others from alighting on your horses or cows. It clears your stock of the pests and promotes their comfort and usefulness. It will rid your stables of flies and will give the tails a rest. It is positively harmless and will not taint the milk. If used on stock in summer it will prevent lice and grub in the winter. Spraying on your horses before going for a drive, it will keep the flies away and prevent the fretting so wearing to a nervous animal. One ounce of the liquid will spray two animals. It is especially valuable to farmers, dairy-men, stablemen and horse-shoers. Once tried, you will not be without it.

One qt. 35c; $\frac{1}{2}$ gal. 60c; 1 gal. \$1.00. By Express or Freight at Buyer's Expense. (Cannot be sent by mail.)



Vogeler's Lice Killer.

Vogeler's Lice Killer is a liquid preparation for destroying insects on chickens, hogs and other stock. It was especially designed for killing lice and mites on chickens and hogs without the necessity of handling, dipping, dusting or greasing the fowls or animals.

Prices: By express or freight, 1-qt. can, 35c; $\frac{1}{2}$ -gal. can, 60c; 1-gal. can, \$1.00; 5-gal. can, \$4.00.

A handy, convenient and economical way to apply Vogeler's Lice Killer is by using the Aspinwall Sprayer. It is strong, durable and the best pump on the market for the price.

Vogeler's Lice Powder.

It is composed of especially selected ingredients ground to a very fine dust, so that when applied it comes in contact with every portion of the skin to which it is applied, and instantly chokes and kills the lice.

Price, 25c per package. By mail, postpaid, 35c.

Zenoleum.

A Carbolic, Cresol, Coal-Tar Preparation. A disinfectant that won't poison, won't explode, won't burn. Destroys lice and mites and prevents the spreading of infectious diseases. Use Zenoleum in the incubator and get hen-hatched conditions. Dip the eggs in Zenoleum and prevent white diarrhoea. The biggest breeders in the world have adopted Zenoleum for these purposes and recommend its use to you.

8-oz. can, 25c; qt. can, 50c; $\frac{1}{2}$ gal. can, 90c; 1 gal. can, \$1.50.

(Sent only by Express or Freight at Buyer's Expense.)

Rose Nicotine.

Most effectual for the destruction of insects on plants. This spray will kill the thrip that is so destructive to orchards. Spray early when the buds begin to swell and again when through blossoming. It is good for lice, fleas, mange, and scab on animals. 6 oz. can 50c; postpaid 60c; 1 pt. can \$1.60; postpaid \$1.70.

Little Aspinwall Sprayer.

THE BEST AND MOST EFFECTIVE HAND SPRAYER ON THE MARKET.



A Necessity in Every Household. Invaluable for Applying Liquid Lice Killer.

Invaluable for exterminating Potato Bugs, Tobacco, Tomato, Cabbage and Currant Worms, and all Plant Insects. Also in killing Lice and Mites in poultry houses.

They are used effectively on Horses, Cattle, and Swine, and for spraying Clothes, Carpets, Cigar Wrappers, etc.

Price: 50c each. By mail, 70c, postpaid.

The Standard Spray Pump



This pump is in reality simply a very carefully designed and accurately made "Squirt Gun," provided with a proper outfit of nozzles.

Its plan of operation is slightly different from other types of spraying apparatus since the hose is used on the suction end instead of the discharge end. This makes it possible to use the pump with a bucket, barrel, tank, or knapsack, depending upon the number of trees or the kind of spraying to be done.

For bucket use a 3½-foot length of hose is supplied. To use it with barrel or tank for a large orchard, a longer hose up to 25 or 30 feet is desirable.

For spraying young or scattering trees or truck crop such as potatoes, tobacco, etc., the

knapsack and short extension are used. With these attachments, the Standard will spray potatoes one row at a time at the rate of an acre an hour or better.

WHAT THE STANDARD WILL DO.

Spray orchards large or small.

Spray vineyards and bushes.

Spray Potatoes and all truck crops.

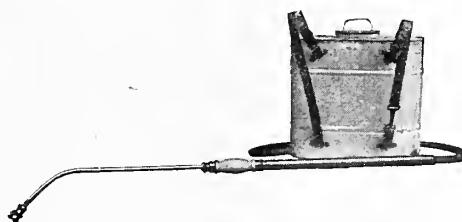
Spray cattle dip and disinfectants.

Spray the tallest fruit trees FROM THE GROUND.

SAVES OVER HALF THE TIME and does its work thoroughly.

THE STANDARD IS MADE ENTIRELY OF BRASS. NO LEATHER PACKINGS. NO IRON CASTINGS TO RUST OR DECAY.

NOTHING TO GET OUT OF ORDER.



Standard Pump with "Potato" Extension and No. 3 Nozzle Attached to Knapsack.

PRICE LIST.

The Standard with 3½-ft. hose and full set nozzles. Each.....	\$5.00
With Knapsack attachments. Each.....	7.50

Farmogerm.

It is always profitable and often necessary to inoculate seeds of Alfalfa, Clover, Peas, Beans, Cowpeas, Sweet Peas and, other Leguminous plants. Unless the right kind of bacteria are present on the roots the plants are unable to gather nitrogen from the air. Farmogerm is a standard preparation; has been thoroughly tested. In addition to increasing the yield of legumes, fertilizer value equivalent to \$30.00 per acre, may be deposited during their growth, for succeeding crops. Farmogerm is applied preferably direct to the seed before planting, by diluting the jelly containing bacteria with water and mixing with the seed. Farmogerm can also be applied to planted fields by sowing a small quantity of inoculated seed, or sprinkling inoculated soil over the area. Be sure to state for what crop Farmogerm is wanted.

Garden size, ¼ acre, 50 cents; postpaid 55c; acre-size, \$2.00; postpaid \$2.10.



Beans, inoculated and uninoculated, showing the benefit of inoculation.

Reference Tables

Number of Plants or Trees to the Acre at Given Distances

Dis. Apart Inches	No. Plants	Dis. Apart Inches	No. Plants	Dis. Apart Inches	No. Plants	Dis. Apart Feet	No. Plants
12x 1	522,720	24x24	10,890	36x36	4,840	5x 5	1,743
12x 3	174,240	30x 1	209,088	42x12	12,446	8x 1	5,445
12x12	43,560	30x 6	34,848	42x24	6,223	8x 3	1,815
16x 1	392,040	30x12	17,424	42x36	4,148	8x 8	680
18x 1	348,480	30x16	13,068	48x12	10,890	10x 1	4,356
18x 3	116,160	30x20	10,454	48x18	7,790	10x 6	726
18x12	29,040	30x24	8,712	48x24	5,445	10x10	435
18x18	19,360	30x30	6,970	48x30	4,356	12x 1	3,630
20x 1	313,635	36x 3	58,080	48x36	3,630	12x 5	736
20x20	15,681	36x12	14,520	48x48	2,723	12x12	302
24x 1	261,360	36x18	9,680	60x36	2,901	16x 1	2,722
24x18	15,520	36x24	7,260	60x48	2,178	16x16	170

Quantity of Seed Requisite to Produce a Given Number of Plants and Sow an Acre

	Quantity per acre		Quantity per acre
Artichoke, 1 oz. to 500 plants	6 ozs.	Grass, Sudan, drilled or broadcasted	18-20 lbs.
Asparagus, 1 oz. to 800 plants	1 lb.	" Sheep's Fescue, Wood Meadow	25-30 lbs.
Asparagus Roots	1,000-7,250	" Italian Rye	20-25 lbs.
Barley	100-120 lbs.	" English, or Perennial Rye	20-25 lbs.
Beans, dwarf, 1 lb. to every 100 ft. of drill	60-90 lbs.	" Orchard, Fowl Meadow	25-30 lbs.
Beans, pole, 1 lb. to 100 hills	30-40 lbs.	" Red Top, Chaff Seed	25-40 lbs.
Beet, garden, 1 oz. to 100 ft. of drill	7 lbs.	" Timothy	10-12 lbs.
Beet, Mangel, 1 oz. to 100 ft. of drill	5 lbs.	Hemp, for Seed	5-8 lbs.
Broccoli, 1 oz. to 5,000 plants	2 ozs.	Hemp, for Fibre	40-50 lbs.
Broom Corn	6-8 lbs.	Horse Radish, roots	10,000-15,000
Brussels Sprouts, 1 oz. to 5,000 plants	2 ozs.	Kale, 1 oz. to 5,000 plants	2 ozs.
Buckwheat	25-30 lbs.	Kohl Rabi, 1 oz. to 100 ft. of drill	4 lbs.
Cabbage, 1 oz. to 5,000 plants	2 ozs.	Leek, 1 oz. to 100 ft. of drill	4 lbs.
Carrots, 1 oz. to 10 feet of drill	3 to 4 lbs.	Lettuce, 1 oz. to 100 ft. of drill	3 lbs.
Cauliflower, 1 oz. to 5,000 plants	2½ ozs.	Martynia, 1 oz. to 100 ft. of drill	5 lbs.
Celery, 1 oz. to 15,000 plants	2 ozs.	Melon, Musk, 1 oz. to 100 hills	1-3 lbs.
Chicory	2-4 lbs.	Melon, Water, 4 ozs. to 100 hills	2-4 lbs.
Clover, Alsike and White Dutch	6-8 lbs.	Nasturtium, 2 ozs. to 100 feet of drill	15 lbs.
" Alfalfa or Lucerne	15-20 lbs.	Oats	60-75 lbs.
" Crimson, or Scarlet	12-15 lbs.	Okra, 1 oz. to 100 ft. of drill	8 lbs.
" Large Red and Medium	12-15 lbs.	Onion Seed, ½ oz. to 100 ft. of drill	4-5 lbs.
" Esparsette, or Sainfoin	30-35 lbs.	Onion Seed, for Sets	40-50 lbs.
Collards, 1 oz. to 5,000 plants	2 ozs.	Onion Sets, 1 lb. to 20 ft. of drill	250-300 lbs.
Corn, pop	4-6 lbs.	Parsnips, ½ oz. to 100 ft. of drill	3 lbs.
" Sweet, ½ lb. to 100 hills	8-10 lbs.	Parsley, ½ oz. to 100 ft. of drill	3 lbs.
" Jerusalem, in drills	4-5 lbs.	Peas, Garden, 1 lb. to 100 ft. of drill	60-90 lbs.
" Jerusalem, for Fodder	40-50 lbs.	Peas, Field	100-120 lbs.
" Field, in hills	8-10 lbs.	Pepper, 1 oz. to 1,500 plants	3 ozs.
" Kaffir, in drills	4-5 lbs.	Potatoes, cut Tubers	400-600 lbs.
" Kaffir, for Fodder	40-50 lbs.	Pumpkins, 3 ozs. to 100 hills	2-4 lbs.
Cress, 1 oz. to 100 feet of drill	12 lbs.	Radish, 1 oz. to 100 ft. of drill	10-12 lbs.
Cucumber, 1 oz. to 100 hills	1-3 lb.	Rye	80-100 lbs.
Dill, ½ oz. to 100 ft. of drill	5 lbs.	Salsify, 1 oz. to 100 ft. of drill	8 lbs.
Egg Plant, 1 oz. to 2,000 plants	4 ozs.	Spinach, 1 oz. to 100 ft. of drill	8 lbs.
Endive, ½ oz. to 100 feet of drill	4 lbs.	Spurry	15 lbs.
Flax, broadcast	30-40 lbs.	Sugar Cane, in drills	5-6 lbs.
Garlic, bulbs, 1 lb. to 100 ft. of drill		Sugar Cane, broadcast	40-50 lbs.
Gourd, 2 oz. to 100 hills		Savory, Summer, 1 pkt. to 100 ft. of drill	1 lb.
Grass, Kentucky Blue, for lawns		Sunflower, Mammoth Russian	8 lbs.
" 1 lb. to 200 square ft.	80-100 lbs.	Squash, Summer, 4 ozs. to 100 hills	2 lbs.
" Kentucky Blue for pasture	25-30 lbs.	Squash, Winter, 8 ozs. to 100 hills	2 lbs.
" Meadow Fescue, or English Blue	20-25 lbs.	Tomato, 1 oz. to 4,500 plants	1 oz.
" Hungarian and Millet	25-30 lbs.	Tobacco, 1 oz. to 5,000 plants	2 ozs.
" Mixed Lawn	70-80 lbs.	Turnip, 1 oz. to 250 feet of drill	1-3 lbs.
" Red Top, fancy, clean, solid	8-10 lbs.	Vetches	100-120 lbs.
Bromus Inermis	25-30 lbs.	Wheat	60-80 lbs.

FOREIGN NAMES OF VEGETABLES AND HERBS.

ENGLISH	GERMAN	FRENCH	SPANISH	ITALIAN	DANISH-NORW.	POLISH
Anise.....	Anis. Gruner Anis.	Anis. Anis.....	Anis. Matalahuga.	Aniso, Anacio.	Anis.....	Anyz.
Artichoke.....	Artischoke.....	Artichaut.....	Aleachofa.....	Artocioeca.	Artiskok.	Karezochy.
Asparagus.....	Sparzel.....	Asperge.....	Esparrago.....	Sparagio.....	Asparges.	Szparazi.
Balm.....	Citronen-Melisse.	Melisse citronelle.	Toronjil, Citronella.	Melissa.....	Balsamurt.	Balsam.
Basil.....	Basilikum.....	Basilie grand.	Albaca.....	Basilico.....	Basilikum.	Bazylia.
Beans.....	Bohnen.....	Hariocots.....	Habichelua.....	Fagioli.....	Boenner.	Fasola.
Beet.....	Rube.....	Betterave.....	Remolacha.....	Barbabietola.....	Roedbede.	Buraki.
Borage.....	Boretsch.....	Bourrache.....	Borraja.....	Boragine.....	Borage.	Boraz.
Broccoli.....	Spargelkohl.	Chou Brocoli.....	Brocoli.....	Brocoli.....	Broccoli-	Kaal....
Brussels Sprouts	Rosenkohl.....	Chou de Bruxelles.	Bretones de Bruselas	Cavolo		Brokuly.
Cabbage.....	Kopfkohl, Kraut.	Chou pomme.....	Col repollo.....	di Brusselles.....	Rosenkaal.	Latorvil.
Cabbage, Savoy.	Wirsing.....	Chou de Milan.....	Col de Milan.....	Cavolo cappuccio.	Hovedkaal.	Kapusta.
Caraway.....	Feld-Kummel.....	Cumin des pres.	Comino.....	Carvi.....	Karve....	Kmin.
Carrot.....	Carotten, Mohren.	Carotte.....	Zanahoria.....	Carota.....	Gulerod.	Marechew.
Cauliflower.....	Blumenkohl.....	Chou-fleur.....	Coliflor.....	Cavoloflore.....	Blomkaal.	Kalafroy.
Celery.....	Sellerie.....	Celeri.....	Apio.....	Sedano.....	Selleri.....	Selery.
Celeriac.....	Knoll-Sellerie.	Celeri-rave.....	Apio-nabo.....	Sedano-rapa.....	Knopselleri	Brukwiana
Chervil.....	Kerbel.....	Cerfeuil.....	Perifollo.....	Cerfoglio.....	Kjoervel..	Czechrzyca
Chicory.....	Cichortenwurzel.	Chicoree sauvage.	Achicoria.....	Cicerio selvatica.	Cichorie.	Cukorya.
Coriander.....	Coriander.....	Coriandre.....	Culanistro.....	Coriandorlo.	Koriander.	Koleder.
Corn Salad.....	Feldsalat.....	Mache.....	Canonigos.....	Valeriana.....	Vaarsalat.	Ziarino
Corn.....	Mais.....	Mais.....	Maiz.....	Mais.....	Mais.....	Kukurudza.
Cress.....	Garten-Kresse....	Cresson alenois...	Mastuerzo.	Agretto.....	Karse....	Rzerzucha.
Cress, Water.	Brunnenkresse....	Cresson de fontaine.....	Berro.....	Nasturzio aquatico.....	Broend- karse....	Rezerzucha wodna.
Cucumber.....	Gurken.....	Concombre.....	Cohombro.....	Cetriolo.....	Agurk....	Ogorek.
Dandelion.....	Lowenzahn.....	Pissenlit.....	Diente de leon.....	Dente di leone.	Loevetand.	Papawa.
Dill.....	Dill.....	Aneth.....	Eneldo.....	Aneto.....	Dil....	Koper.
Egg Plant.....	Eierpflanze.....	Aubergine.....	Berengena.....	Petroneciano.....	Aegplante.	Jajkowa rosolina.
Endive.....	Endiven.....	Chicoree Endive.	Endivia.....	Indivia.....	Endivie...	Endywia.
Fennel.....	Fenchel.....	Fenouil.....	Hinojo.....	Finocchio.....	Fennikel.	Koper.
Garlic.....	Knoblauch.....	Ail.....	Ajo.....	Aglio.....	Hvidloeg.	Czosnek.
Horse Radish.....	Meer Rettig.....	Raifort sauvage.	Taramago.....	Rafano.....	Peberrod.	Chrzan.
Hyssop.....	Isop.....	Hyssope.....	Hisopo.....	Issopo.....	Isop....	Hyzop.
Kale.....	Blatterkohl.....	Chou vert.....	Breton, Berza.....	Cavolo verde.....	Greenkaal.	Solanka.
Kohl Rabi.....	Knollkohl.....	Chou-rave.....	Col rabano.....	Cavolo rapa.....	Kaarabri.	Kalarepa.
Lavender.....	Lavendel.....	Lavende.....	Espliego.....	Lavanda.....	Lavendel.	Lawenda.
Leek.....	Porre, Lauch.	Poireau.....	Puero.....	Porro.....	Purre....	Pory.
Lettuce.....	Lattich, Kopfsalat	Laitue.....	Leehuga.....	Lattuga.....	Salat....	Salata.
Marjoram.....	Majoran.....	Marjolaine.....	Mejorana.....	Maggiorana.....	Merian....	Majeranek.
Melon.....	Melone.....	Melon.....	Melon.....	Popone.....	Melon....	Melon.
Melon, Water.	Wasser-Melone...	Melon d'eau.....	Sandia.....	Melone d'aqua.....	Vandmelon	Melon, wodny.
Mushroom.....	Schwamm.....	Champignon.....	Seta.....	Fungo pratajolo..	Cham- pignon...	Grzyb.
Nasturtium.....	Kapuciner Kresse.	Capucine.....	Capuchina.....	Nasturzio.....	Blomkarse.	Nastureya.
Oker.....	Ocher.....	Gombaud.....	Gombo.....	Oera.....	Hibiskus.	Glinka biatozotta
Onion.....	Zwiebel.....	Ognon.....	Cebolla.....	Cipollo.....	Roedloeg.	Cebula.
Parsley.....	Petersilie.....	Persil.....	Perejil.....	Prezzemolo.....	Persille....	Pietruszka.
Parsnip.....	Pastinake.....	Panais.....	Chirivia.....	Pastinaca.....	Pastinak.	Pasternak.
Peas.....	Erbse.....	Pois.....	Guisante.....	Pisello.....	Erter....	Groch.
Pepper.....	Pfeffer.....	Piment.....	Pimiento.....	Peperone.....	Spanks	Peber....
Pumpkin.....	Melonen-Kurbiss.	Potiron.....	Calabaza totanera.	Zucca.....	Graeskar..	Bania.
Radish.....	Radies.....	Radis.....	Rahanito.....	Ravanello.....	Reddk.	Rzodkiew.
Rhubarb.....	Rhabarber.....	Rhubarbe.....	Ruibarbo.....	Rabarbaro.....	Rhabarber.	Rubar- barum.
Rosemary.....	Rosmarin.....	Romarin.....	Romero.....	Rosmarino.....	Rosmarin.	Rozmaryn.
Rue.....	Raute.....	Rue.....	Ruda.....	Rosmarino.	Rude....	Ruta.
Ruta Baga.....	Kohlruhe, Wrucken	Chou-navet.....	Col nabo, Nabicol.	Cavolo navone.	Roe....	
Saffron.....	Safran.....	Safran.....	Azafran.....	Zafferano.....	Safran....	Szafran.
Saxe.....	Salbei.....	Sauge.....	Salvia.....	Salvia.....	Salvie....	Szalwija.
Salsify.....	Haferwurzel.	Salsifis.....	Salsifi blanco.....	Sassefria.....	Havrerod.	Jarzynva ostryga.
Sorrel.....	Sauerampfer....	Oseille.....	Acedera.....	Acetosa.....	Syre....	Szczaw.
Summer Savory	Bohnenkraut....	Sarrette annuelle	Ajedrea comun.	Santoreggia.....	Sar....	Caber
Spinach.....	Spinat.....	Epinard.....	Espinaca.....	Spinace.....	Spinat....	ogrodowy.
Squash.....	Kurbiss.....	Courge.....	Calabaza.....	Zucca.....	Squash....	Szpinak.
Swiss Chard.....	Reisskohl.....	Poiree.....	Bleda.....	Bietta.....	Blad bede.	Miekurz.
Thyme.....	Thymian.....	Thym.....	Tomillo.....	Timo.....	Timian....	Macier- zanka.
Tomato.....	Liebesapfel.....	Pomme d'Amour..	Tomate.....	Pomo d'oro.....	Tomat....	Pomidor.
Turnip.....	Weisse-Rube....	Navet.....	Nabo.....	Navone.....	Turnips...	Rzepa.
Wormwood.....	Wermuth.....	Absinthe.....	Ajenjo.....	Assenzio.....	Malurt....	Piotun.



Vogeler Seed Company

Salt Lake City, Utah

THE ARROW PRESS, SALT LAKE